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NEWS: EUROPE

Tietmeyer split with Brussels on Emu

By Andrew Fisher in Magdeburg

Differences between Germany and the European Commission over how monetary union should be implemented broke out into the open yesterday when Mr Hans Tietmeyer, president of the Bundesbank, criticised the method proposed in the recent Brussels green paper.

Although he did not state the central bank's objections, it is known to disagree with the green paper's proposal that a joint currency should be introduced in stages - first for large banking and other payments transactions and later for the public - after European monetary union (Emu) has been agreed.

The Bundesbank wants the new coins and notes to be brought in for all users at the end of the process, or

several years after Emu's likely start in 1999.

"We think this is too important a subject to be solved at a rapid gallop," Mr Tietmeyer said at a press conference after the central bank council met in East Germany. "In the Bundesbank, I can say we have a certain reservation about the critical mass concept (set out in the green paper) as it has been presented."

Under this concept, the new coins and notes would be brought in first for banking, insurance, commercial and government use. But the public would continue using national currencies until a "critical mass" had been established for the new currency's full introduction.

The Commission argues this would make the notion of a joint currency more credible to citizens.

The Bundesbank feels credibility should be possible without having to lead up to the widespread use of a joint currency and thus favours the "delayed big bang" idea. It points out that while big banks will be able to adjust to the staggered introduction of the new currency - Deutsche Bank, Germany's biggest bank, supports the green paper - smaller savings and other banks will need more time to adjust their operations, especially computer systems.

Mr Theo Waigel, Germany's finance minister, also at the Bundesbank meeting - before flying to the Halifax summit of leading industrial nations - was more circumspect, but made clear the government also did not agree fully with the Commission's proposals. "The discussions should not be limited to one scenario," he said.

Both men also highlighted the role in the Emu preparations of the European Monetary Institute, the Frankfurt-based forerunner of the planned European central bank. Mr Waigel said the EMI's view was of "great significance". Mr Tietmeyer said it was conducting intensive studies into how Emu should be introduced and had sent out a questionnaire to banks; the EMI's initial views should be presented by the year's end.

So far, the institute has not commented on the green paper. It had no speakers at last week's Emu conference organised by Deutsche Bank and attended by Mr Yves-Thibault de Silguy, the European monetary commissioner, who presented the paper to a partly sceptical audience.

Mr Waigel emphasised the importance of strict adherence to the economic convergence criteria ahead of Emu. "The convergence criteria are, and remain, more decisive for us than all timetable plans," he said.

Noting that Germany was well within the criteria, he said its budget deficit could fall to 1 per cent of gross domestic product by 2000, if public spending rose only 3 per cent a year. "This would be well below the Maastricht criterion (of 3 per cent) which we achieved last year."

Both men expressed confidence in the progress of the east German economy. Mr Tietmeyer hoped the high level of transfers and subsidies to the east - totalling some DM160bn (£72bn) a year - could gradually be reduced over the longer term as growth, investment and job creation improved.

Bosnian minister fuels fears of big military offensive

By Laura Silber in Belgrade and Our Foreign Staff

Bosnia's foreign minister yesterday fuelled expectations of an imminent military offensive to break the Serb encirclement of Sarajevo by saying the city could not endure another winter under siege.

Mr Muhamed Sacirbey, an outspoken member of Bosnia's Muslim-led government, said in Vienna that his country's army had to take "preventive measures" because the Serbs were introducing new armour into the Sarajevo area despite international warnings to keep heavy weapons out.

"This exclusion zone and ultimatum have not been honoured and the Serbs have brought new forces and new weapons into the area. There-

fore we do have to take preventive measures," Mr Sacirbey said after talks at the Austrian foreign ministry.

He declined to comment directly on reports from United Nations officials in Sarajevo that up to 30,000 Bosnian government soldiers were massing north of the capital, in an apparent preparation to break the 38-month-old Serb encirclement.

"I can neither confirm nor deny (the reports) but certainly as part of our overall strategic situation... we must be prepared not to liberate Sarajevo but actually to defend Sarajevo at this time," he said.

As well as voicing concern about the Bosnian army build-up, UN officials said they feared the Bosnian Serbs were stalling on the release of 36

peacekeepers who remain in custody despite the release in recent days of more than 300 others.

Mr Yuri Chizhik, a UN spokesman, said that Bosnian Serbs still held 26 UN military observers and soldiers, including 12 Canadians.

Mr Radovan Karadzic, the Bosnian Serb leader, claimed on Tuesday that only 14 would remain in custody for a short time longer, for what he described as technical reasons.

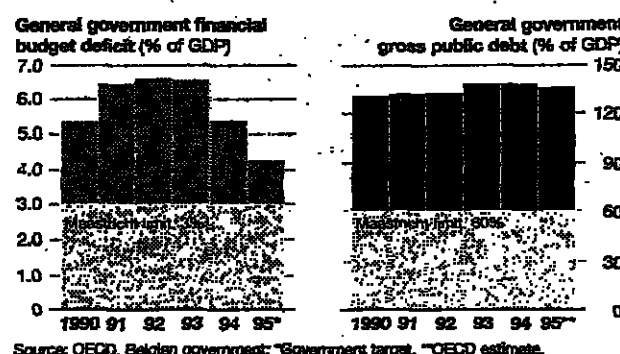
Mr Chizhik said that "all the technical obstacles are with the Bosnian Serbs, not with us" and UN officials said there were indications that the hostages were still being used as insurance against further NATO air raids. The Serbs took nearly 400 UN peacekeepers hostage after NATO air strikes

on May 25 and May 26. One official said of the remaining hostages: "They are being held as human shields in the most sensitive locations."

He said four of them had been seen at the Javorina radar station complex, a radar and air-defence command centre of the former Yugoslav army on a peak near Pale, the mountain stronghold above Sarajevo.

The facility is said to be used to monitor NATO aircraft - from the moment they take off from Aviano airbase in Italy. In other signs of increasing tension, Canadian peacekeepers based in Visoko, just north of Sarajevo, said they were braced for a Bosnian government offensive but could not confirm whether it would be aimed to break the siege.

Belgium's budget deficit and public debt



Belgian PM to give priority to Emu targets

By Emma Tucker in Brussels

The new Belgian government, expected to be in place by the end of next week, plans to reduce spending drastically and radically rewrite laws on competitiveness, in an effort to be one of the first countries to be party to a single European currency.

Mr Jean-Luc Dehaene, the Christian Democrat prime minister, intends to make reductions in the budget deficit one of the priorities of his centre-left administration, for which negotiations are being completed following last month's general election.

Belgium is determined to join France, Germany, the Netherlands and Luxembourg as the first to accept a single currency before the end of the century.

But questions have been raised about Belgian participation because of its high government deficit and, more seriously, the largest debt as a ratio of gross domestic product in Europe.

The Maastricht treaty stipulates that for a country to participate in European monetary union (Emu), it must reduce its debt-to-GDP level to 60 per cent, or at least be moving towards that target at a satisfactory pace, and reduce its deficit to 3 per cent of GDP.

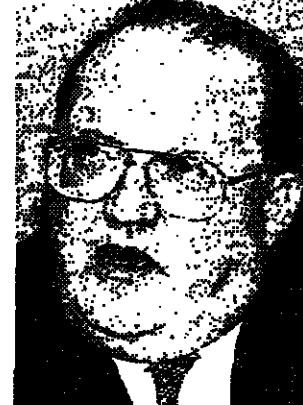
Belgium's deficit in 1994 was 5.4 per cent of GDP. Its debt-to-GDP ratio is 138 per cent.

The new government, again a coalition of the Christian Democrat and Socialist parties in power before the May election, is expected to agree to spending cuts of BF105bn (€23.2bn) for next year and a change in the law which will allow the government to pre-empt deteriorations in the country's competitiveness.

The drastic spending cuts in a country where government spending has traditionally been high, and where unemployment is running at 10 per cent, are likely to anger Belgium's powerful trade unions.

However, the Socialist party, one of the main coalition partners, has already agreed to respect the 3 per cent target for the budget deficit.

The savings are expected to come mainly from pensions, health and social security spending, in spite of emotional election pledges by the social-



Dehaene: determined

ists to safeguard Belgium's generous social security system.

In an attempt to prevent over-spending, Mr Dehaene has also proposed a change in the country's 1989 law on competitiveness.

This says that if Belgium loses market share to its immediate neighbours and if one of four other criteria - principally wage costs - shows a deterioration in relation to those of trading partners, then government, unions and employers are supposed to come forward with proposals to deal with the problem.

If they fail, the government can intervene. The proposed law will more narrowly define trading partners - currently seven countries - as France, the Netherlands and Germany.

Furthermore, when the current freeze on wages is lifted next year, the government may decide to set a maximum level for wage increases based on projections for wage growth among the three main trading partners from the Organisation for Economic Co-operation and Development and the International Monetary Fund. This will end Belgium's unique tradition of automatically indexing wages.

The government is likely to face a barrage of complaints from employers who believe the contributions they have to make to the social security system are damagingly high.

Some have even threatened to relocate to other countries where the tax burden is less heavy.

However, with the government having so little room for manoeuvre their requests are unlikely to be heeded.

Belgrade's shadowy strongman steps into diplomatic spotlight

By Laura Silber in Belgrade

Mr Jovica Stanisic showed just the faintest flicker of a smile. But smiling does not come naturally to the head of Serbia's state security police. Not for the first time, he had succeeded in persuading Bosnian Serb leader Radovan Karadzic to free United Nations hostages.

Mr Karadzic and his colleagues looked uncomfortable sitting beside him in the Bosnian Serb headquarters of Pale as Mr Stanisic, throwing steely glances around the room, announced another success for his boss, President Slobodan Milosevic of Serbia.

Mr Stanisic is the police chief turned "special envoy", entrusted by Mr Milosevic with carrying out his promise to western mediators to secure the release of the hostages.

Mr Stanisic was with the all-powerful secret police for more than a decade before the Serbian president rose to power in 1987 but had never been seen in public until a fortnight ago when he began his mission to free the hostages.

Outside of Mr Milosevic's family - Serbia's first lady, Mrs Mira Markovic, is a powerful figure - Mr Stanisic wields the most influence as one of the chosen few who enjoys regular access to the Serbian president. He is said to speak to or see him daily.

The secret of Mr Stanisic's diplomatic success lies in the fact that he was with the Bosnian Serbs from the start of their aggression. He helped them to procure arms and organise their own police forces in 1992. The paramilitary forces, backed by the Yugoslav Army, carried



Jovica Stanisic: Milosevic's spy chief who knows the secrets of the Bosnian Serbs

out "ethnic cleansing" - expelling, killing, or imprisoning tens of thousands of Muslims from eastern and northern Bosnia in the first months of the war - were backed by Serbia's secret police.

But with relations between Mr Milosevic and the Bosnian Serbs severed - in theory at least - what leverage was Mr Stanisic able to exercise over his wayward kinsmen in Bosnia? According to one observer in Belgrade, Mr Stanisic was likely to have travelled to Pale with threats to reveal financial corruption or details of crimes committed during the war.

The Bosnian Serb leaders, who according to a Serbian MP "adore" Mr Stanisic, know that he does not bluff.

Serbia is the only former communist country in Europe where the police have not been reformed or even challenged to loosen their grip over society.

Indeed under the presidency of the Mr Milosevic, the police have doubled in size to about 100,000. The exact size of Mr

Stanisic's secret service - who form an elite section of the police - is not known.

The prominence in Serbian life of the secret service, and its ability to infiltrate and manipulate all institutions, helps to explain why Serbian politics seldom follow western patterns.

In December 1993, for example, when inflation had skyrocketed to an incredible 100 per cent per month, there was virtually no protest. Mr Milosevic's Socialist party even managed to win in a legislative election. Opposition parties complain that they are powerless against the propaganda machine which the Serbian president has built up with the help of the security police.

The iron grip in which the Belgrade regime holds the country - because of its heavy reliance on the services of Mr Stanisic - has made it easier for the Serbian leadership to shift policy abruptly without having to explain itself.

Without the flexibility which

he has secured by building up a strong secret service, Mr Milosevic could hardly have allowed himself the luxury of currying favour with the west by abandoning his nationalist proxies in Bosnia and Croatia.

Mr Stanisic grew up in modest circumstances in Crenkova, a town in Serbia's northern province of Novi Sad. His next-door neighbour, Mihail Kertes, is another faithful henchman of Mr Milosevic and himself a secret policeman.

For many Serbs, Mr Stanisic's name will still be whispered, always associated with the murky world of the Sluzba Drzava Bezbednost (SDB), the state security agency.

When Belgrade University, where he graduated in political science in 1974, was organising a class reunion recently, his was the only phone number which was impossible to find, wrote Mr Ivan Radovanovic of Vreme, the independent weekly magazine.

There were just three letters written after his name - SDB.

UK unveils plan to trim EU legislation

By Lionel Barber in Luxembourg

Britain yesterday stepped up its drive to reduce the amount of European Union legislation with two new proposals aimed at curbing the powers of the European Commission and strengthening the role of national parliaments.

The proposals came up at a meeting in Luxembourg of the Reflection group of government-appointed experts charged with preparing the agenda of next year's inter-governmental conference to review the Maastricht treaty.

Response was said to be

lukewarm, amid suspicions that the UK is seeking to "roll back" Brussels powers in favour of a looser, more flexible European Union at next year's IGC.

The debate over the IGC agenda pits small against big countries, as well as federalist-minded countries such as Germany and Benelux against sovereignty-conscious Britain and France.

The trickiest issues are majority voting, the right of veto, and the powers of the European Parliament, and the degree of integration necessary to accommodate enlargement to central and eastern

Europe in a Union of up to 27 members.

In Luxembourg yesterday, Mr David Davis, the UK representative, called for a "sunset clause" in which European Commission proposals for legislation would expire if they were not adopted by the Council of Ministers, the top decision-making body.

UK officials said that a three year "sunset clause" would, for example, eliminate the Fifth Company Law directive requiring worker representatives on company boards, first introduced in 1972, or plans to harmonise speed limits.

Mr Davis also sketched ideas

for national parliaments to vet proposals from the Commission to see if they passed a test of "subsidiarity", the code-word for testing whether decisions should be taken at EU, national or local level.

Mr Carlos Westendorp, the senior Spanish diplomat who is chairman of the Reflection Group, said there was a "broad consensus" that the Commission should retain monopoly right of initiative in legislation.

Mr Westendorp said there was "no great support" for offering national parliaments a second chamber alongside the European Parliament,

mainly because it would make EU decision-making even more complicated than at present.

Several delegations favoured giving the European Parliament more powers to make the Commission more accountable, but not to the point of voting on the Commission president.

At present, the president is appointed by member states, subject to the assent of the Parliament.

The Reflection Group, which contains two MEPs and a member of the Commission, will produce a report for the European summit in Madrid in December.

EUROPEAN NEWS DIGEST

Gunmen attack Russian city

Dozens of heavily armed men dressed in camouflage gear yesterday stormed a southern Russian city, killing at least 40 civilians and taking hundreds of hostages in an attack Russian officials linked with besieged separatist forces in nearby Chechnya. First deputy prime minister Oleg Soskovets said the gunmen demanded the withdrawal of Russian troops from Chechnya.

Postfactum, a Russian news agency, quoted a spokesman for Mr Dzhokhar Dudayev, the leader of Chechen separatist forces, denying responsibility for the attack, but the incident provoked a fierce reaction from the Russian leadership and raised fears that it could be the beginning of a wave of Chechen terrorism within Russia. According to Russian officials the gunmen entered Budyonovsk, a Russian city of 100,000 some 10km from Chechnya, in two buses and a military jeep. Attackers stormed the city, temporarily seizing a hospital, a bank, and a government building and cutting off the town's communication with the outside world.

After an afternoon of gun battles, the gunmen were reported to be holding 160 hostages in the town and to have fled with other hostages, including schoolchildren, in the direction of Chechnya. Mr Sergei Medvedev, spokesman for President Boris Yeltsin said "the president is deeply concerned by the terrorist attack of Chechen militants in the Stavropol region which resulted in casualties, hostages and disruption of the constitutional order".

Christina Freeland, Moscow

Corporate governance code

The European Union needs a code of best practice for corporate governance standards, as institutional investors increasingly seek to exercise control over the companies they own, according to a paper by the Centre for European Policy Studies, an influential think tank. The study on corporate governance in Europe, to be published today, argues that changes are needed in the relationship between the owners and managers of companies.

The paper urges the adoption of one share, one vote rules, a departure from practice in much of Europe where companies are allowed to set a ceiling on the voting influence of shareholders, regardless of the percentage of shares they own. It says the model code ought to emphasise that shareholders are entitled to appoint or remove directors, approve the dividend and the creation of new shares, and approve corporate by-laws.

Norma Cohen, Investments Correspondent

Yeltsin accept Lebed resignation

President Boris Yeltsin yesterday accepted the resignation of General Alexander Lebed, the maverick commander of Russian forces in Moldova. Gen Lebed, who is often touted as a possible presidential candidate in elections scheduled to be held next year, tendered his resignation earlier this month in protest at Moscow's plans to downgrade the army under his command and withdraw it from Moldova within three years.

Mr Yeltsin was thought to be wavering over Gen Lebed's resignation because of the danger that, released from his distant army headquarters and military discipline, the charismatic officer would be free to devote his energies to a political career.

Christina Freeland, Moscow

Probe into Spanish phone-taps

Spain's attorney-general has ordered an investigation into unauthorised phone-tapping by the Ceasid intelligence service, which is reported to have recorded conversations by King Juan Carlos as well as politicians, journalists and businessmen. The defence ministry said the tapes, dating from 1984 to 1991, were meant to have been destroyed.

Amid a fiery political row over the disclosures, Mr Narcis Serra, deputy prime minister, and Mr Julián García Vargas, defence minister, are due to report on the eavesdropping activities to a closed-door parliamentary committee meeting today. The affair has brought sharp criticism from within the governing Socialist party, as well as from opposition politicians. Mr José Bono, president of Castilla-La Mancha and the only Socialist regional leader to win an outright majority in elections last month, said the phone-tapping was "unacceptable".

David White, Madrid

Restraint on company chairman

Mr Guy Dejouany, chairman of Compagnie Générale des Eaux, the French utilities and communications group, has been placed under a limited form of judicial control by a French magistrate investigating corruption allegations. Mr Jean-Michel Prêtre, a magistrate from the French overseas territory of Réunion in the Indian Ocean, took the action after interviewing Mr Dejouany in relation to accusations of bribery in the award of water supply contracts in Saint-Denis, the island's capital.

Générale des Eaux stressed that the new judicial order would not restrict Mr Dejouany's ability to continue managing the group, and stressed that he had in no way been involved in any incriminating matters. Mr Dejouany is the latest in a series of French business leaders to be ensnared in corruption investigations.

Andrew Jack, Paris

Choice narrows on oil pipeline

The international consortium created to exploit oil reserves in the Caspian Sea off the coast of Azerbaijan will choose between two possible export pipeline routes within two months, officials from the consortium said yesterday. Exporting oil from the rich Caspian Sea basin has emerged as the largest remaining hurdle facing the \$7bn project. The pipeline will offer political leverage and significant revenues to the countries through which it passes.

Officials from the consortium said they had narrowed the selection down to two routes: one passing through Georgia to the Black Sea port of Batumi, the second, a more circuitous northern one through Russia to Novorossiysk on the Black Sea. The consortium hoped to make a choice between the two routes within two months.

Christina Freeland, Moscow

ECONOMIC WATCH

Current account setback

France's seasonally-adjusted current account surplus fell in March to FF1.72bn (\$1.37bn), against FF1.85bn the previous month and FF1.17bn a year ago, the finance ministry said yesterday. Unadjusted, the surplus was FF1.89bn, compared with a FF2.24bn deficit in February. The adjusted surplus was slightly below the FF1.7bn-FF1.8bn forecasts. The outlook from financial transactions totalled FF25.8bn, including short-term investment outflow of FF11.6bn. The long-term capital outflow was FF7.2bn, while the deficit on direct investments widened as the French invested more abroad. The deficit on securities investment dwindled to FF200m. The current account surplus for the first quarter was FF1.47bn, compared with FF1.92bn for the same period last year.

■ Greece's retail sales index rose by 3 per cent in March year-on-year after a 4.5 per cent increase in February, the national statistics service said.

■ Finland's unemployment rate fell to 17.8 per cent in May from 18.3 per cent in April, the labour ministry said.

Source: Datastream

1994

FF1.72bn

FF1.85bn

FF1.17bn

FF2.24bn

FF2.58bn

FF11.6bn

FF7.2bn

FF200m

FF1.47bn

FF1.92bn

FF17.8%

FF18.3%

FF3%

FF4.5%

FF25.8bn

FF11.6bn

FF7.2bn

FF200m

FF1.47bn

FF1.92bn

FF17.8%

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FF1.47bn

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FF17.8%

FF18.3%

FF3%

FF4.5%

FF25.8bn

FF11.6bn

FF7.2bn

FF200m

FF1.47bn

FF1.92bn

FF17.8%

FF18.3%

FF3%

Fresh strike at Alitalia as anger grows

By Andrew Hall in Milan

The long-running dispute between the management of Alitalia, the Italian state airline, and the unions entered a new and unpredictable phase yesterday when pilots staged a wildcat strike in protest at restructuring plans.

Anpac and Appl, the main pilots' unions, warned that after more than six months of deteriorating relations with the state carrier's management, they were in danger of losing control over the union rank and file.

Yesterday's action began with what unions claimed was a spontaneous rally of pilots at Rome airport, many of whom then refused to work or called in sick.

Mr Renato Rivera, the airline's chairman, threatened criminal proceedings against the pilots for breaking the law which requires transport workers to give notice of industrial action and guarantee certain minimum services.

The airline said about one in four of its national and international flights out of Rome was cancelled, with knock-on effects for other incoming and outgoing services.

The Italian government has so far declined to use special legal powers to block the strikes by the airline's workforce.

Although the government has offered to mediate between the two sides, there are signs that it is prepared to toughen its line.

Yesterday, Mr Lamberto Dini, Italian prime minister, met the transport minister, labour minister and the chair-

Boost for Dini as far left splits on pensions

By Robert Graham in Rome

Long-simmering differences within Reconstituted Communism, formed from the hardline members of the old Italian Communist party, exploded yesterday over pensions reform and led to a formal split.

The break-up of the party, with the departure of 14 of the 39 deputies, will have important consequences for the passage of legislation reshaping Italy's deficit-ridden state pensions system. Although the break-away deputies are committed to introduce some amendments, they have announced they will back the general line of the reforms.

The defection - the third split in a political party this year - comes in advance of next week's debate in the chamber of deputies on the pensions proposals. It should give a boost to the precarious parliamentary majority on the issue of the government of prime minister Lamberto Dini.

The votes of these same deputies were vital for Mr Dini's government when they broke with party discipline and voted in favour of the mini-budget on March 16.

Differences became irreconcilable when Mr Fausto Bertinotti, the party leader, insisted on pursuing a policy of obstruction of the pension reform proposals by tabling 2,700 amendments. The proposals were worked out between the government and the leaders of the three main trades union confederations, with whom Mr Bertinotti has often been in strong disagreement.

"There seems to be a more constructive and reasonable way other than obstructionism of obtaining results that satisfy workers' interests," observed Mr Rino Serrì, a senator and one of the dissidents.

The dissidents have been led by Mr Sergio Garavini, a former trades unionist and deputy since 1987. Apart from 14 deputies, the break-away group comprises three senators and two Euro-MPs. In a formal note the group said their resignation from the party would now allow them to work to create "a federation of the left".

This should bring them closer to the Party of the Democratic Left (PDS), the largest political force on the left, which they refused to join when the Communist party was buried in January 1991. Reconstituted Communism rejected the abandonment of Marxist ideals and felt the adoption of a social democratic platform by the PDS was a betrayal of an ideological tradi-



Dini can expect backing on pensions from some communists

tion going back to Antonio Gramsci in the thirties.

At first it called itself a movement and only became a party in December 1991. The party's support base has steadily grown, appealing to both the older-generation nostalgic communists and a young protest vote. Mr Bertinotti has combined hardline views with an aristocratic accent and a courteous manner, making him a popular politician.

Before the split, the party accounted for almost 7 per cent of the national vote. The support of this vote could well determine whether the centre-left alliance, headed by the PDS, wins a majority in the next elections. Until now the PDS and its centrist partners have shied away from an open alliance at a national level with a party that labels itself communist. The question now is how much of the vote will remain with Mr Bertinotti.

ABB and Daimler deal faces full probe

By Emma Tucker in Brussels

The European Commission has indicated it will open a full investigation into a joint venture between Daimler-Benz, the German industrial group, and Asea Brown Boveri, the international electrical engineering group, which are joining forces to create the world's biggest railway equipment business.

Competition authorities in Brussels are worried that the venture - to be known as ABB Daimler-Benz Transportation - will give the companies a dominant position in the supply of railway equipment and could harm competition.

"It would be rather surprising if the Commission did not decide to open a detailed investigation into a joint venture of this size," said a commission official yesterday.

The joint venture cannot go ahead until it has the approval of the Commission which is expected to announce a detailed investigation before the end of the month.

It will then take some four months for Brussels to hear submissions from the two companies, competitors and domestic competition authorities.

There are likely to be strong complaints from the Bundeskartellamt, Germany's domestic competition authority, which has voiced concern over the effect the joint venture will have on the German market.

ABB is one of the world's three largest railway equipment suppliers alongside Siemens of Germany and the British-French GEC-Alsthom alliance.

The merger with the railway equipment arm of Daimler's troubled AEG subsidiary would make it about 40 per cent larger than its two main rivals, with a 1995 order intake estimated at DM8bn (\$5.5bn).

The venture, which will employ 22,000 people in 40 countries, will have its headquarters in Berlin and retain main manufacturing centres in Germany, the UK and Scandinavia.

ABB and Daimler will hold equal shares.

However, Daimler has agreed to pay ABB \$900m dollars in cash to compensate for the smaller size and operating losses of the businesses it is contributing.

Both companies have previously said there are no grounds for rejection of the joint venture, although the Bundeskartellamt expressed reservations about an aborted merger plan by Siemens and the AEG railway equipment division two years ago.

It is rare for Brussels to block joint ventures completely although it may demand modifications from the parties involved.

Polish banker takes political gamble

By Christopher Bobinski in Warsaw

The head of Poland's independent central bank, Mrs Hanna Gronkiewicz-Waltz, yesterday said she was ready to stand as the candidate of the united anti-communist right wing in the autumn presidential election.

Her declaration represents a real threat to President Lech Walesa, who is planning to run for a second five-year term. Mr Walesa was hoping to garner the support of the various disparate right-wing, nationalist groups and the Solidarity trade union - political territory which Mrs Gronkiewicz-Waltz is now hoping to capture.

Until now Ms Gronkiewicz-Waltz, who was nominated to



Hanna Gronkiewicz-Waltz, the central bank post by President Walesa, has remained his loyal supporter. Indeed she

government, led by the former communists, suspected that the bank's tight monetary policies were rooted in a desire to improve Mr Walesa's chances in the forthcoming election. However, Mrs Gronkiewicz-Waltz is expected to draw fire from President Walesa for pulling the central bank into the political fray.

The bank is already under attack from Mr Grzegorz Kolodko, the deputy prime minister and finance minister, who says its delay in lowering interest rates has contributed to higher than planned inflation this year, currently at an annualised 31 per cent. Mrs Gronkiewicz-Waltz's entry into the political arena is likely to increase attacks on the bank's policies.

An academic specialising in banking law who came to head the bank three years ago, Mrs Gronkiewicz-Waltz argues that President Walesa's chances of winning the elections are so low that he should step aside. She said he should allow a stronger candidate to lead the campaign to stop the former communist Left Democratic Alliance (SLD) from capturing the presidency.

Mrs Gronkiewicz-Waltz said in recent interviews that President Walesa's achievements were so great that he should not risk defeat in the elections.

Mr Alexander Kwasniewski, the SLD leader, is leading the polls in the presidential race with about 20 per cent support, while Mr Jacek Kuron, a former dissident and Solidarity adviser who is running a

moderate anti-communist campaign, has an 11 per cent rating, slightly less than Mr Walesa's 12 per cent.

In the most recently published polls, Mrs Gronkiewicz-Waltz enjoyed a 4 per cent share of the vote.

The anti-communist right, whose roots are in the Solidarity movement, remains as split as it was in the 1993 parliamentary election.

On that occasion the various right-wing groups stood separately and failed to enter parliament while the former communists went on to form the government thanks to an electoral law favouring the larger parties.

The various right-wing leaders have said that they will agree on their common candidate early next month.

Row over Russian way of making capitalists

By Christie Freeland

When Novosibirsk was founded just over a century ago it was swiftly dubbed the Russian Chicago. Now, with the collapse of communism, the city - established to serve as Russia's gateway into the wild steppe of Siberia - has again become one of Russia's frontiers.

An intense legal and political battle being waged at the Novosibirsk Tin Factory, the former Soviet Union's monopoly producer, is emerging as a test case of Russia's capitalist transformation.

Like many of Russia's more

talented former Soviet factory directors, Mr Alexander Dugelny, the enterprise's manager for the past eight years, has succeeded in using the privatisation process to transform himself from communist functionary into capitalist proprietor.

A vigorous 42-year-old who sports the obligatory sharp western suit and sleek mobile phone of Russia's *nouveau riches*, Mr Dugelny still enjoys the tremendous power of personal patronage which was the traditional prerogative of Soviet industrial managers. For the tin factory's 1,300 employees "he is tsar and god",

his former personal assistant says.

Today he owns nearly 5 per cent of the factory outright and admits that, in effect, he controls a majority stake in the enterprise through intermediaries. The Novosibirsk factory's capacity of 20,000 tonnes of tin a year, and its output of 11,000 tonnes last year - more than five times greater than that of its nearest European rival - makes Mr Dugelny's newly acquired portfolio a valuable one.

The metamorphosis of men like Mr Dugelny from comrades into capitalists has been one of the most typical stories

in Russia's chaotic transition to the market economy and liberal reforms in Moscow have quietly sanctioned this "nomenklatura privatisation" as the only politically feasible means of breaking with Russia's 70-year communist legacy.

However, in Novosibirsk, the politically expedient calculation of Muscovite reformers has run into a roadblock which could have consequences for Russia's ambitious privatisation programme.

Over the past year, a small band of lawyers and police investigators, aided by a crusading reporter, have set out to prove that the privatisation of the Novosibirsk Tin Factory was illegal. Their allegations rest on a number of byzantine twists in Russia's convoluted privatisation legislation, but the gist of the case is that, in order to take over the factory cheaply, Mr Dugelny artificially reduced the buy-out price and manipulated factory workers into selling him their shares.

The journalist whose stories helped to spur the investigation has been physically threatened and factory employees who challenged the privatisation have been pushed out of their jobs, but, remarkably, three Russian courts have upheld their contention that the factory was privatised in an illegal manner and ruled that the privatisation must be revoked.

A final appeal is now pending before the Presidium of the Higher Arbitrage Court, the nation's highest civil court, and criminal investigations have been launched against the Novosibirsk Tin Factory's management. The court's decision, expected later this year, and the outcome of the investigations are likely to mark a turning point in Russia's anar-



chic race to the market economy.

Mr Dugelny's opponents, who have seized upon the case with an almost missionary zeal, believe that if the higher court upholds the rulings of the lower chambers their decision will be a watershed victory for the rule of law over the largely unbroken might of the *nomenklatura*.

As Ms Yana Rogozhina, the tough 32-year-old prosecutor who led the investigation, explains: "Some people say that the prosecutor was blocking the development of a new economic order, but the end does not justify the means. The prosecutor says the law is above everyone and must be followed by everyone."

A police investigator who is pursuing the criminal aspects of the case and asked that his name not be reported, warns that unless the "illegal seizure" of assets by Russia's former apparatchiks is stopped now, the seeds could be sown for trouble in the future. "What will happen in a few years when the country wakes up and sees who owns it?" he asks.

But Mr Dugelny and his supporters, who include the archi-

facts of Russia's economic reforms, see him as a martyr to lingering Russian opposition to private business and warn that if he loses his legal battle the real victim will be Russia's fragile capitalist economy.

Mr Dugelny admits to some of his critics' harshest allegations, but sees no wrong in them. For example, one of his policies which provoked the fiercest outcry in Novosibirsk was the internal system he established within the factory whereby he and his intermediaries bought shares from the workers in exchange for consumer goods purchased at the factory's expense.

But Mr Dugelny argues that his 20 years of service to the factory have entitled him to reap some of the benefits of privatisation and asks why Muscovite financiers and traders, rather than the Soviet industrial elite, have a greater right to become the country's new capitalists.

Mr Dugelny's strongest defence, and one which has been taken up by Mr Anatoli Chubais, the deputy prime minister who led Russia's privatisation drive, is that, no matter what sins were committed along the way, privatisation cannot now be reversed.

"The important question is, what is the goal of raising this issue?" Mr Dugelny asks. "Do we want laws for their own sake, or laws for the sake of society?"

Even Mr Dugelny's opponents admit that if the privatisation is annulled, protecting the rights of legitimate outside shareholders would be a problem. As the Novosibirsk police investigator concedes, "to protect the rights of honest shareholders is very hard because to separate them from the dishonest shareholders is nearly impossible."

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A BETTER APPROACH TO BUSINESS

NEWS: THE AMERICAS

Sense of betrayal in Democratic camp

President Clinton's budget cuts plan is firmly rejected by his own side, reports Jurek Martin

The "morning after" reactions to any significant presidential initiative can often be written in advance. His party will broadly support him, the opposition will not and battle will again be joined.

That was not President Bill Clinton's fate yesterday after he had told the nation in a television address on Tuesday night that he proposed to balance the federal budget in 10 years, rather than seven as the Republicans wanted.

Far more significant than the faint Republican praise for his Damascus conversion - "too little and a bit late" was the standard response - was the palpable sense of betrayal from Democrats in Congress.

The mere act of Mr Clinton signing up to the deep budget-cutting advanced by the Republicans far off in their eyes his kinder, gentler and longer-term approach, which spared education and took less of an axe to healthcare for the old and poor.

Congressman David Obey of Wisconsin, senior Democrat on the House appropriations committee, thought Mr Clinton had again caved in to pressure. "I think most of us learned some time ago that if you don't like the president's position on a particular issue you simply need to wait a few weeks."

Congressman Richard Gephardt and Senator Tom Daschle, the two minority leaders, had earlier tried to talk the president out of his new tack. Afterwards, Mr Gephardt commented:



Daschle (centre) and Gephardt (right) failed to get Clinton to drop his new tack, while all Byrd said was "flip-flop".

"The real losers will be the elderly and the families that support them." All Senator Robert Byrd, the prolix West Virginian, could say was "flip-flop".

Congressman Donald Payne of New Jersey, head of the congressional black caucus, which has usually been in the president's corner, said: "Ten years is as unreasonable as seven to make these cuts. It's

a quantum leap backwards for social policy."

Even Senator Joseph Lieberman of Connecticut, no flaming liberal, qualified his opinion. "I think he's being smart, but I'm afraid I'm in the minority up here." Congressman Charles Stenholm from Texas was rare in his praise. "There has to be a point when you stop saying what you're against and say what you're for." However,

the senator has long been a budget hawk.

Tensions between president and party were evident in Mr Clinton's first two years but were kept under control by the Democratic majority leadership - Senator George Mitchell and Congressman Tom Foley, the Speaker - to the point that legislation unpopular with rank-and-file Democrats, such as the North American

free trade agreement and the Uruguay Round, was passed.

Now that it is in the minority, the party's agenda seems to be diverging from that of the president ahead of next year's elections. Congressional Democrats, especially liberals, believe their best chances lie in fighting to keep the social infrastructure the party has built over the last 60 years.

They were comparing Mr Clinton's conversion to giving support to the need for a balanced budget with President George Bush's 1990 agreement to a tax increase. This flew in direct contradiction of his "read my lips, no new taxes" promise of the 1988 campaign and severely weakened his reelection prospects.

The president, on the other hand, senses a strong tide running in favour of balancing the budget among the independent-minded voters whose support he needs if he is to improve on the 43 per cent electoral share he won in 1992.

Equally, by entering the budget battle with his own, if still sketchy, plan, he may stand a better chance of modifying or stopping the most radical Republican cuts in social spending, many of which remain unpopular with the public.

Mr Clinton is also a "policy wonk", as knowledgeable as any politician about how government actually works and what it does well and badly. To stand on the sidelines while the Republicans change his nature would surely have tested his patience.

Chilean army defies Frei government

By Imogen Mark in Santiago

The Chilean army has taken General Manuel Contreras, the former secret police chief, into its own care, in a move that appears to challenge government authority.

The army has made no secret of its unhappiness with a Supreme Court ruling sentencing Gen Contreras to six years' imprisonment for the 1976 murder of Mr Orlando Letelier, a former Socialist minister, in Washington.

Army chief and former military ruler General Augusto Pinochet has said his forces would respect the order.

But the army mounted an elaborate operation before dawn on Tuesday to move the general from his farm in southern Chile to a naval hospital at Talcahuano, near the town of Concepción. He was smuggled out without the knowledge of the police guards around his property.

The army also flew a decoy aircraft to Santiago, apparently to distract the press, while Gen Contreras was taken by helicopter to Talcahuano. The

army claimed later the general's health had deteriorated suddenly forcing a landing at the hospital instead of flying to Santiago.

The government was kept in ignorance of the former general's whereabouts for several hours. Mr Carlos Figueroa, the interior minister, admitted that the government had "contradictory information" about Gen Contreras's movements.

President Eduardo Frei broadcast a televised message on Tuesday calling on all citizens to respect the law and democratic institutions, and to have confidence in the democratic regime.

Any questioning of due legal process "would put at risk our stability, our country's international image and our national life together".

Opposition party leaders blamed the government and the judiciary for the delay in executing the sentence, passed two weeks earlier. Last-minute appeals by the defendant's lawyers have delayed the detention order, expected to be served on the general yesterday.

Havana permits private restaurants

By Pascal Fletcher in Havana

Cuba's government authorised private restaurants yesterday but at the same time applied strict regulations and hefty monthly licensing fees.

While the measure had been long expected as a further step in Cuba's cautious economic reforms, many owners of existing clandestine restaurants in Havana complained that the high fees would force them to shut.

"I was just doing it to get by. With these fees, I'll have to close down," said one woman who had been running a small clandestine restaurant charging

\$1 a meal in the back yard of her home in the Havana suburb of Miramar.

The government had until now been turning a blind eye to the dozens of private restaurants, known as "paladares" after a word borrowed from a popular Brazilian television soap opera, which had sprung up in homes and back yards in Havana and other cities.

Following the latest authorisation, private restaurants, who could include permanent foreign residents in Cuba, would have to pay a minimum monthly fee of 400 Cuban pesos (\$100).

Opposition lodges evidence to show PRI may have spent 60 times more than allowed

Zedillo faces funding scandal in Tabasco poll

By Leslie Crawford in Mexico City

Sixteen boxes of bank ledgers, check stubs, invoices and receipts have landed Mexico's ruling Institutional Revolutionary party (PRI) in one of the more embarrassing scandals of its 66 years in power.

The boxes were presented by the opposition Revolutionary Democratic party (PRD) to the attorney-general's office late on Tuesday as apparent evidence of illicit campaign spending during elections in the south-western state of Tabasco last November.

The PRD claims the documents prove the PRI spent 337m pesos, then worth \$70m, on the governorship race which Mr Roberto Madrazo, the PRI candidate, won.

The figure exceeds the legal limit on campaign spending 60 times over, and is more than twice the amount President Ernesto Zedillo reported spending on his presidential campaign last year. Officially, the ruling party spent just under 4m pesos on Mr Madrazo's campaign. He polled 290,000 votes.

"We knew very little about how the ruling party spent its money, but now, for the first time, we have documentary proof of the PRI's illegal and lavish spending in a state election," alleged Mr Andrés Manuel López Obrador, the defeated PRD candidate in Tabasco.

Mr López Obrador has mounted a bitter attack on his PRI rival and asked Mr Antonio Lozano, the attorney-general, to investigate. Mr Madrazo has refused to comment on the allegations.

The local PRI in Tabasco said the documents were forgeries.

However, it has also filed charges in the local courts accusing the PRD for theft.

In private, government officials say they have no doubt the documents are genuine and that they were leaked by someone within the PRI who bore a grudge against Mr Madrazo.

"This is an awful scandal for [President Ernesto] Zedillo," said a senior government official. "It typifies everything the president is fighting against: dirty elections, no accountability." The official, however,

doubted Mr Madrazo would be forced to resign.

Mr Madrazo, a powerful operator in his oil-rich state, staged an unprecedented rebellion by the local PRI in January, when he came under pressure to resign following the PRD's allegations of electoral fraud.

His supporters blocked highways, closed down businesses in the state capital Villahermosa, and briefly took over the state television network to broadcast their defiance of Mr Zedillo.

Following the riots, the government claimed it had never asked Mr Madrazo to step down.

Many in government have named the scandal "Moctezuma's revenge". Mr Esteban Moctezuma, the interior

minister, has not forgotten Mr Madrazo's revolt against his central authority. Both men are rivals in their ambition to lead the national party.

"At stake is who gets to rewrite the rules for the nomination of the next presidential candidate," one government official said. Mr López Obrador, meanwhile, plans to camp out in Mexico City's rain-drenched central square, the Zócalo, until the government attends to his complaints.

"The government cannot afford to ignore the accusations," said Mr Santiago Creel, a citizen councillor at the Federal Electoral Institute.

The documentation raises questions about the source of those campaign funds.

NEWS: WORLD TRADE

Airbus to run military project

By Bernard Gray in Paris

Airbus is to manage the development of the new Future Large Aircraft military transporter, it was announced at the Paris Air Show yesterday.

The European aircraft consortium will be the largest single shareholder in the project. The four owners of Airbus - Astrotech of France, Daimler-Benz Aerospace of Germany, British Aerospace and Casa of Spain - will hold the remainder of the shares, along with Alenia of Italy.

Final shareholdings in the group have not yet been agreed and will depend on the number of aircraft each country

chooses to buy when the project is reviewed in spring 1996.

However, British Aerospace said that Airbus would not have a 51 per cent shareholding in the new venture, which would have allowed the FLA project to operate as a subsidiary. Instead, the FLA company will be an associate of Airbus with the Airbus consortium managing the project.

The British Ministry of Defence yesterday welcomed the agreement, notably the fact that it would be under Airbus' commercial management. "The UK is actively involved in seeking to establish a way of rejoining the project," the ministry said.

Airbus management of the military project is a new phase in the 25-year history of the consortium, which has established itself as the world's second largest manufacturer of civil aircraft after Boeing of the US. An operational team has been established at Airbus' headquarters in Toulouse to prepare the next phase of the FLA programme.

The pre-development phase of the FLA is due to last from 1996 to 1998 and full development between 1998 and 2003 with production schedules thereafter.

However, the crucial test for the aircraft will come next year when the partner govern-

ments have to agree on the number of aircraft to be purchased and will have to provide funds for the £2bn to £3bn development programme.

The Euroflag consortium, which has been responsible for the FLA so far, is being wound up. At the same time, the feasibility study for the FLA has been completed, confirming that the aircraft will carry 25 tonnes of payload more than 2,000 nautical miles and will be able to operate from short semi-prepared runways.

The FLA will be powered by four turbo-prop engines and will have a four metre-wide cargo bay to allow it to carry two Land Rovers side by side.

Shorts wins £40m military contracts

By John Murray Brown in Dublin

Short Brothers, the British aerospace company privatised in 1989, has won two military support contracts worth £40m (\$62.8m) with Middle East customers.

The deals were announced yesterday by company president Mr Roy McNulty, during the Paris airshow and involve the maintaining of communication systems and support equipment, and training technical and maintenance personnel in several Middle East countries.

Mr McNulty said the military support business was an "important and growing market sector" for the Belfast company, and the contract would further strengthen their position.

Shorts, now owned by Bombardier of Canada, also announced a missile agreement with Texas Instruments of the US, to supply the British defence ministry.

The company also announced a series of co-operative and licensing agreements and the winning of a £2.6m Ministry of Defence contract to supply the Stiletto series supersonic target for air-to-air combat training.

Deficit drove Brazil car curbs

Angus Foster on a setback to the past five years of liberalisation

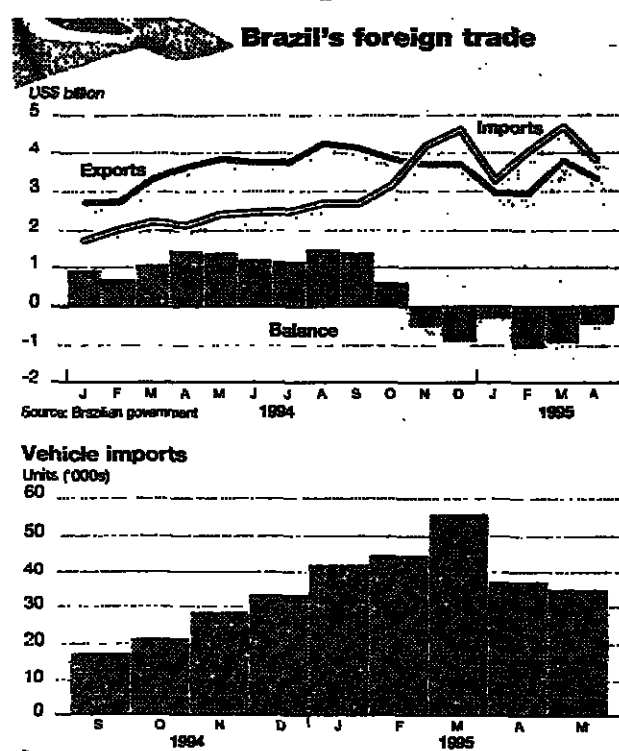
São Paulo's Europa Avenue, nicknamed "import alley" because of its miles of showrooms for shiny imported BMW and Japanese cars, was looking decidedly lacklustre yesterday.

The Brazilian government's decision on Tuesday to set a limit on car imports this year and introduce quotas from next January has left not just concessionaires angry. A former finance minister described the measure as "an unnecessary step back". A former central bank governor said it would hurt consumers. And the World Bank's chief economist for Latin America, Mr Sebastian Edwards, described the move as a "very worrying precedent".

Mr José Serra, planning minister and the man most in favour of the measures, insisted they were not protectionist and formed part of a new industrial strategy for Brazil's car industry. But perhaps the most telling response was the immediate welcome the new policy received from São Paulo's industrial federation, a notoriously protectionist lobby.

The measures, a big setback for Brazil's five-year-old economic liberalisation, stem from a mounting trade deficit since a new anti-inflation currency was launched last July. A growing economy, overvalued Real currency and consumer optimism led to a flood of imports and an accumulated deficit for the first four months of this year of \$2.79bn.

Rather than devaluing, the government decided to use curbs on car imports, which had risen rapidly since Novem-



ber, as a way of bringing down the deficit. In March, import tariffs were raised from 32 to 70 per cent, but not before a government misbanding of the announcement led to a last-minute flood of import orders.

Tuesday's announcement goes even further and sets a fixed limit on the number of cars to be imported this year. About 200,000 vehicles have been imported so far, and the government will allow only a further 60 per cent of that total, or about 100,000. If cars waiting at Brazil's ports and on order from foreign factories are

included, the limit may already have been reached.

From next year, the government will limit the imports of car makers with plants in Brazil to a fixed proportion of their exports, probably 1 for 1. These companies, which include Volkswagen, General Motors, Ford and Fiat, will also start to enjoy tax benefits on their imports of components.

If, as most analysts expect, the demand for imported cars remains high, the government will insist that car makers without production in the country will have to bid for

import quotas. These are likely to be set at a fixed proportion of domestic production, yet to be decided.

The government said a final decision on whether to introduce the quotas would depend on imports and the country's balance of payments this year. But analysts said the 70 per cent tariff would need to be renewed in March and the quota system would be introduced then in its place.

Ms Dorothea Wernke, industry minister, said the new rules would promote investment by car companies in Brazil while the tax benefits would make Brazilian exports more competitive. Car manufacturers, which last year produced 1.58m vehicles, hope to be making 2.5m-3m units by the end of the century, making Brazil one of the largest producers.

Brazil's foreign ministry said the new measures did not contradict its responsibilities under the World Trade Organisation, but the country's trade partners may not agree. Under WTO rules, quotas are illegal except under specific circumstances, only one of which - an imminent balance of payments problem - may be relevant in Brazil's case.

But Brazil's foreign reserves are above \$30bn and ministers keep insisting it will record an overall trade surplus this year. Car imports have fallen sharply since the tariff increase, and are less important than imports of other consumer durables and capital goods. Trade partners such as the US, which expressed "concern" about the 70 per cent tariff, may argue the latest measures are not suitable.

Argentina fears industry damage

By David Pilling in Buenos Aires

The Argentine car industry could be seriously damaged if Brazil were to impose quotas on imports of Argentine vehicles, officials in Buenos Aires said yesterday.

Mr Domingo Cavallo, economy minister, said such restrictions would "violate agreements" made at Ouro Preto last year, in which rules for the vehicle sector were

established as part of the Mercosur customs union. Under that agreement, Argentine car-makers have free access to the Brazilian market.

On Tuesday morning, Argentina had been convinced it had won the assurance of Mr Fernando Henrique Cardoso, Brazil's president, that its vehicle exports would continue to be exempt from quotas.

But officials yesterday admitted to being "confused" by the wording of the decree, issued

on Tuesday night, which seemed to imply Argentina was not.

The possible rule changes coincide with a bad time for Argentina's vehicle industry which has suffered a 38 per cent fall in domestic sales this year as credit becomes less easily available in the aftermath of Mexico's devaluation.

To compensate, Argentine manufacturers have boosted exports to Brazil by 40 per cent, hoping to transform last

year's sectoral trade deficit of \$1bn with its northern neighbour into a surplus of \$600m.

Restrictions on Argentine cars could affect the plans of several multinationals, such as General Motors, Ford and Fiat, which have pledged to invest \$3bn in setting up production plants in Argentina.

Most have done so with the intention of exporting to Brazil, whose vehicles market is four times bigger than Argentina's.



The Boeing 777-300: suitable for high-density medium-range routes, it can seat up to 550

Boeing wins \$3.1bn orders

By Michael Skapinker, Aerospace Correspondent

Four Asian airlines have promised orders worth \$3.1bn for 31 Boeing 777-300s (pictured above), Boeing said yesterday.

Twenty of the orders for the lengthened versions of the Boeing 777 are new. The others are either confirmations of existing orders or conversions of orders for other 777 models.

The first 777-300 - which can carry up to 550 passengers - will be delivered to Cathay Pacific in spring 1998, with deliveries to the other three buyers - All Nippon Airways, Korean Air Lines and Thai Airways International - to start later the same year.

The announcement of orders for the "stretched" model follows the entry into service last week of the first version of the aircraft, the 777-200. The standard 777 carries between 300 and 400 passengers.

Boeing said the "stretched"

model would be 33 feet longer than the 777-200, with a total length of 242 feet. A 777-300 with three classes would carry 388 passengers. An aircraft with only business and economy class could carry 451 passengers, while an all-economy 777-300 could hold 550 passengers.

Mr Ron Woodard, president of the Boeing commercial aircraft group, said he expected airlines to use the 777-300 as a replacement for early versions of the Boeing 747.

He said the "stretched" 777 would have the same passenger capacity as the early 747s but would burn one-third less fuel and have 40 per cent lower maintenance costs. Boeing said it expected the 777-300 to be used on high-density medium-range routes. It will continue to offer its 747-400 for very long-range routes.

Boeing said ANA had ordered 10 new 777-300s in addition to 18 existing orders

for 777-200s. Cathay Pacific will be taking seven of its 11 existing 777 orders in the stretched version. Korean Air Lines will order four 777-300s and convert another four of its eight 777-200 orders to the "stretched" version.

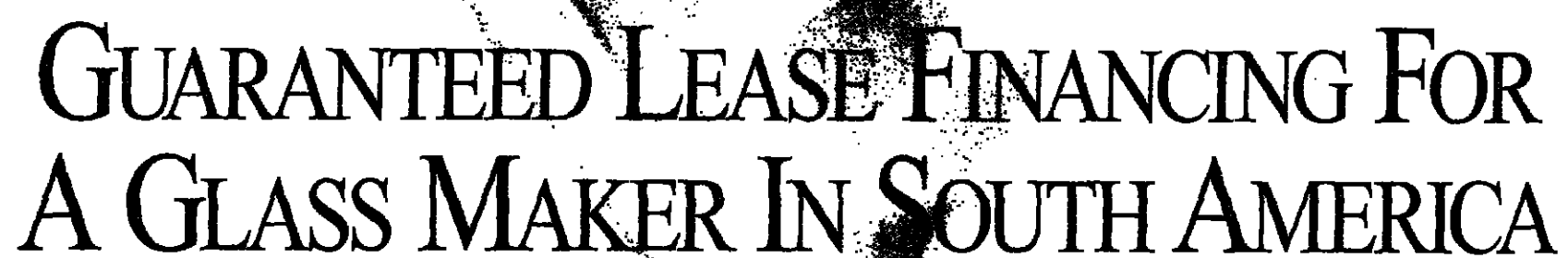
Thai will be ordering six 777-300s in addition to eight 777-200s already on order.

● Daimler-Benz Aerospace (Dasa), the aerospace subsidiary of Germany's biggest company, yesterday said it had sold 13 used Dornier 228 turbo-prop aircraft to Aeronautical Industrial Engineering and Project Management, a Nigerian aviation company which operates mainly domestic flights. Michael Lindemann adds from Bonn.

At the Paris air show this week Dasa has sold three new Dornier 228s to the Royal Thai Navy, which now operates a total of six such aircraft for coast guard duties.

Y damage

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NEWS: ASIA-PACIFIC

French ties cut by New Zealand and Australia

By Nikki Tait in Sydney, Terry Hall in Wellington and William Dawkins in Tokyo

Australia and New Zealand yesterday said that they were freezing all defence co-operation with France, in protest at the decision by Paris to recommence nuclear testing in the South Pacific. Japan also reacted angrily to France's decision, a doubly sensitive matter on the 50th anniversary of the atomic bombing of Hiroshima and Nagasaki.

French President Jacques Chirac announced on Tuesday that his country would begin a series of eight tests at Mururoa Atoll in September, ending a three-year moratorium. France plans to conclude the tests by May 1996, in time to sign an international test ban treaty.

Mr Yohel Kono, Japan's foreign minister, said the move betrayed the trust of non-nuclear countries, which had recently agreed indefinitely to extend the nuclear non-proliferation treaty. Mr Hervé de Charette, his French opposite number, informed Mr Kono of the decision by telephone yesterday.

In reply, Mr Kono asked the French government to reconsider the tests.

Mr Tomichi Murayama, the Japanese prime minister, plans to raise what he called the "regrettable" decision at the summit of the Group of Seven

industrialised nations which opens today in Halifax, Nova Scotia.

The French decision provoked strong criticism among delegates at a United Nations conference on disarmament in Nagasaki. Mr Wolfgang Hoffmann, Germany's representative to the UN conference on disarmament in Geneva, dubbed it "politically incorrect".

In a formal statement Mr Paul Keating, Australia's prime minister, said that Australia "deplored" the decision and was "adamantly opposed" to nuclear testing by any nuclear weapon state. He added: "In recent months, we have made our opposition very clear to the French, including to President Chirac. Mr Keating is understood to have written personally to the French president, arguing against a resumption of testing."

Meanwhile, in a snap debate in parliament in Wellington, Mr Jim Bolger, New Zealand's prime minister, said New Zealand troops had died "in their thousands" in two wars helping defend France and had received in return the "absolute rejection of the South Pacific" so that the French military could get "bigger toys".

There is growing popular support for New Zealand to send a frigate to the test zone, as the then Labour government did in 1974. However, Mr Don McKinnon, New Zealand's

foreign minister, said that the world was "very different from the cold war days of 1974" - and that one problem was a 200-mile economic zone around the French Pacific territory.

Mr McKinnon told Mr de Charette by telephone yesterday that France was disregarding world opinion, and abruptly stopped a meeting with Mr Jacques Le Blanc, the French ambassador, after the diplomat kept coming up with "lame excuses" for the resumption of tests.

Meanwhile, the 15-nation South Pacific Forum, whose leaders are due to meet around the time that the French tests recommence, strongly condemned the decision, saying that it demonstrated "flagrant disregard" for world opinion and that its timing was "particularly provocative".

Philippine President Fidel Ramos said: "Testing of this nature will again encourage the production of nuclear arms, which is counter-productive to the environment of peace that we now enjoy here in our region." Indonesia's Foreign Office said France was in breach of an agreement at the recent UN Nuclear Non-proliferation Treaty conference for nuclear weapons states to exercise restraint.

In a marked contrast to elsewhere, reaction from European governments was mild or non-existent. The British foreign



Dominique Girard, French ambassador to Australia, waves away reporters after meeting foreign minister Bob McMullan

office said: "We see no reason why a limited programme of tests need affect the prospects of a successful negotiation of a comprehensive test ban treaty."

For New Zealand, Mr Bolger said defence links with France, except those affecting humanitarian and UN peacekeeping roles, would be frozen. Senator Bob McMullan, Australian trade minister, said existing defence links such as training and joint maritime air surveillance would be maintained, but new ties, including defence contracts, would not proceed.

But despite the expressions of outrage, no wider trade sanctions against France were threatened yesterday, although the Australian Council of Trade Unions urged consumers to boycott French products - a tactic endorsed by Senator McMullan.

"We don't intend at this stage to pursue some sort of breach of international law

that would allow us to take unilateral action against France... and if contracts have already been entered into, we're not suggesting people should breach them. But I think a lot of [Australians] will make our disapproval effective through the checkout counter and through the way we use our money."

French exports to Australia were worth A\$1.6bn (£721m) in 1994. The widespread indignation could also raise particular difficulties for Axa, the French insurance group, which is seeking to acquire a 51 per cent interest in National Mutual, Australia's second largest life company, for A\$1.1bn.

The agreed deal needs the backing of 75 per cent of policyholders, and some anti-French sentiment because of the nuclear issue is already evident. This has been particularly prominent in New Zealand, where about 38 per cent of NML policyholders live.

Negotiations scheduled in a week as Tokyo seeks to head off a breakdown in relations

Japan and US agree to resume car talks

By William Dawkins in Tokyo

The US and Japan agreed yesterday to resume talks on their car trade dispute, so reducing the risk of the row disrupting the Group of Seven industrialised nations' summit, which opens today in Halifax, Nova Scotia.

Mr Ryutaro Hashimoto, Japan's minister for international trade and industry, yesterday invited the US to send senior officials to reopen talks in Geneva on June 22 and 23, less than a week before the June 28 deadline for US tariffs on \$5.9bn (£2.7bn) of Japanese luxury car imports. The most recent round of talks in the 20-month dispute broke down on Monday night.

The invitation partly reflects Japanese eagerness not to allow the trade row to harm other areas of its relationship with Washington. Mr Tomichi Murayama, the Japanese prime minister, will today meet President Bill Clinton in an attempt to smooth relations, before the start of the G7 summit in Halifax. It also reflects the Canadian host government's anxiety to prevent the trade row from interfering with the summit's busy agenda.

The two leaders may today discuss cars, but will not negotiate, said officials. Mr Murayama is also expected to tell Mr Clinton that the Japanese government is prepared to make more increases in public spending to stimulate the fragile economy and curb the current account surplus.

In another gesture towards keeping the trade row at bay during the summit, Mr Hashimoto announced that he did not plan to meet Mr Mickey Kantor, the US trade representative, in Halifax. Japan would attend the next Geneva talks "without any preconditions", said Mr Hashimoto. The move was welcomed both by leading Japanese car makers and by Mr Walter Mondale, the US ambassador to Japan. Japanese officials are aware

that Mr Clinton's need to satisfy the Republican Congress gives him little room for manoeuvre on the car trade dispute. They do not want to jeopardise the mutual reassurance achieved at the previous Murayama-Clinton bilateral in Washington in January.

Mr Murayama, attending what may turn out to be his final international gathering as Japanese leader, equally wants to push ahead with other priorities at the G7, say officials. Tokyo would especially like to see an improved early warning

system for countries in financial trouble, to reduce the risk of a Mexico-style catastrophe taking place among the emerging economies on its own doorstep in East Asia.

Japanese officials have fought hard for the inclusion of such a plan in drafts on which the summit communiqué will be based. Mr Murayama is also expected to support draft plans to double the emergency loans available to crisis-hit countries under the International Monetary Fund's general agreement to borrow.



Hashimoto: not planning a meeting with Kantor

In addition, Japan is eager to make its first contribution to the G7's deliberations on Bosnia. Mr Yohel Kono, deputy prime minister and foreign minister, early last month became the first Japanese cabinet member to make an official visit to Croatia, where he indicated that Tokyo was willing to help mediate in the Balkan conflict.

Mr Kono, who will accompany the prime minister in Halifax, is keen to demonstrate Japan's interest in matters outside Asia, thus bolstering its candidacy for a permanent seat on the United Nations Security Council.

Pakistani budget side-steps IMF targets

By Farhan Bokhari in Islamabad

The Pakistani government yesterday unveiled an annual budget which appeared to distance the country from a structural adjustment programme being undertaken with the International Monetary Fund.

The budget contained a target of reducing the country's chronic budgetary deficit from 5.6 per cent of the gross domestic product only to 5 per cent during the coming year - significantly higher than a target of 4 per cent agreed earlier with the IMF.

Pakistan is in the second year of the three-year programme under which it is due to receive \$1.5bn (£940m). So far the

country has drawn down just under a third of that amount, with the most recent tranche disbursed last September. However, the future of the programme has fallen into doubt, as the country has failed to meet the performance criteria set by the Fund for the fiscal year which ends this month.

In the budget the government of Ms Prime Minister Benazir Bhutto also announced that maximum tariffs would be cut from the present rate of 70 per cent to 65 per cent - above the earlier target of 45 per cent agreed with the IMF.

Mr Makhdoom Shahabuddin, minister of state for finance, said while giving the budget speech: "The less drastic the

reforms, the less drastic the burden on our honourable, hardworking citizens."

Independent analysts and western economists in their first reaction described the budget as one which avoided harsh measures that could be politically damaging. The government is to raise up to PR\$16.3bn (\$643m) through new revenue and taxation measures, after several days of speculation that the amount could be at least double that.

Domestic fuel prices were increased by 5 per cent while the wealth tax charged on farmland was raised by 25 per cent. The government also promised to get tough with tax evaders by improving the efficiency of the tax

department through measures such as computerisation. Duty free allowances for Pakistanis returning from abroad were also reduced. The government forecast that it may earn more than PR\$1bn through the changes in the customs procedures.

An IMF mission is due to visit at the end of this month to discuss the future of the programme, and the outcome of the talks is not clear. But some Pakistani officials are convinced that the country's success in building up its official foreign exchange reserves to \$2.5bn, equivalent to 12 weeks of imports, almost 10 times the amount of two years ago, will help strengthen its case with the Fund.

ASIA-PACIFIC NEWS DIGEST

US urges boat people to return

The United Nations High Commissioner for Refugees said yesterday it had distributed an open letter from the US consulate in Hong Kong to Vietnamese boat people urging them to return home. The letter, signed by Mr Jeffrey Badier, acting US consul general, said the Clinton administration was opposed to US congressional proposals calling for resettlement of some 40,000 Vietnamese refugees still in Asian camps. Nearly all have been through a screening process at which they have been judged ineligible for refugee status and therefore not entitled to resettlement. Excitement over the congressional proposals has been blamed for recent unrest in detention centres throughout the region.

"The US 'is unequivocal in its belief that return home is the sole remaining option for those who are not refugees', said the letter. It also told the migrants that many of those who choose to go home may become eligible for legal emigration. It noted that 'nearly 600,000 Vietnamese have already been resettled in other countries by applying in Vietnam to various orderly departure programmes'."

South Korean budget up 14%

South Korea's Finance Ministry said it would propose a budget for calendar 1996 of between Won62,500bn (\$51bn) and Won63,000bn, a 14 to 15 per cent increase from this year's Won54,830bn. The proposal, which will now be discussed by cabinet and parliament, was far less than the Won78,310bn which about 40 government offices had demanded. A ministry official said the draft was based on a forecast that the economy would grow 7 per cent next year in real terms from a projected 6 per cent this year.

Manila land dispute erupts

Ayala Land, the Philippines' biggest property company, is to sue the Philippine government over the bidding process for a 240 hectare site of prime Manila real estate. The contract to develop Fort Bonifacio was won in January by a 19-member consortium led by Metro Pacific, Philippine subsidiary of Hong Kong-based First Pacific. It offered 33,000 pesos (\$200) per square metre for the site. Ayala Land, which came second offering 24,000 pesos, says the Metro Pacific broke the rules by submitting a flawed surety bond to guarantee the second 19.6bn peso half of the payment.

White House to decide Vietnam recognition soon

By Nancy Dunne in Washington

The White House is debating a recommendation by Mr Warren Christopher, the US secretary of state, that Washington establish diplomatic relations with Vietnam for the first time since 1975, when US troops were airlifted out of the country in a humiliating withdrawal.

A decision is expected by the end of the month. If it is favourable - and most observers expect that it will be - then Mr Christopher may visit Vietnam at the end of an Asian trip in early August.

The US has been moving slowly towards full diplomatic relations for years, with Hanoi providing increased co-operation in the US effort to locate missing US prisoners of war. Hope that some of the missing may yet be found alive has faded as one mission after another returned with nothing more than bones.

"The time is right. The moon, the planet, the stars, all are lining up on this one," said a State Department official.

Senator John McCain, a Republican and former prisoner of war in Vietnam, last month called for a normalisation of relations. This provides political cover for the White House and ensures that criticism from Republicans on the

Capitol Hill will be muted. Congressman Bill Richardson, a New Mexico Democrat, recently returned from Vietnam with 100 pages of material on the missing.

"Given Vietnam's massive and recent co-operation on the MIA [missing in action] issue, I think it may be time to recognise them," he said. Vietnam also has turned over other documentation relating to more than 1,600 Americans considered missing in action.

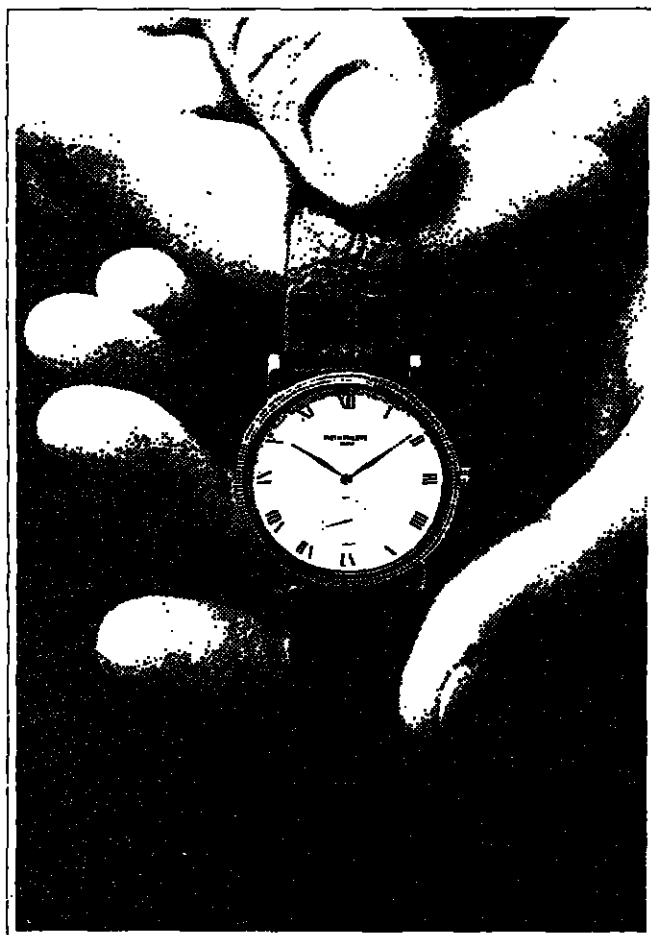
Mr Christopher's support for recognition is reportedly based on a recommendation from Mr Winston Lord, assistant secretary of state for South-East Asia.

Opposition is politically driven and emanates from the National Security Council. However, the State Department official said that no one who opposes diplomatic ties would vote for Mr Clinton in any case.

Movement towards full relations has been urged by the US business community, which sees the former enemy as a market for infrastructure contracts and capital goods. The US is well behind Japanese and European companies in the area.

Cementing its links within the region, Vietnam is next month to become the seventh member of the Association of South-east Asian Nations.

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Levels of
poor nation
to 20-year

Wolfgang Guha

World Bank aid from
the world's richest countries
fell in 1994, the first
year since 1980 that it
has not risen. The fall
was not unexpected, as
the world's richest countries
are now more concerned
with their own economic
problems. The World Bank
said that the total amount
of aid from rich countries
to poor countries fell by
1.5 per cent in 1994, to
\$11.5bn. This is a record
low for the World Bank.
The report, Reality of Aid,
states that the gap between
the amount of aid that
rich countries promised
and the amount they actually
gave was 1.5 per cent of
GDP, the per capita income
of the UN aid targets.
The report also says that
the average aid to poor
countries fell in 14 of the 31
countries of the OECD's Development Assistance Committee.
The average aid to poor
countries fell from 0.23 per cent
of GDP in 1993 to 0.22 per cent
in 1994. The report also says
that governments are in danger
of losing sight of the fight
against poverty.

\$6bn new fleet deal signals revised flight plan for Saudia

Details, expected to be announced on the Saudi airline's 50th anniversary on Sunday, point toward a restructuring, writes Robin Allen



Saudia Arabia's national airline is expected formally to announce on Sunday, its 50th anniversary, that it will buy up to 60 long- and shorter-haul aircraft worth some \$6bn (\$3.75bn) from Boeing and McDonnell Douglas.

Saudis turn to Islamic banks

By Robin Allen in Dubai

Islamic banks are expected to play a prominent role in financing Saudia's purchase of \$6bn of new aircraft over the next 10 years.

Islamic banks - and Islamic banking divisions of western banks which have greater placing power - "now have enough experience and assets to easily absorb a deal this size", according to one Saudi joint-venture banker. Islamic banks have already raised Islamic funds for aircraft leasing.

Using Islamic banks would be "politically correct" as well as practical. It would also be an innovation for Saudi Arabia, which, despite a hypersensitive insistence on the pre-eminence of its Islamic identity, has so far shied away from allowing domestic Islamic banks to advertise the fact, because it would draw attention to the fact that the bulk of the banking system is based on interest.

Bringing in Islamic as well as domestic and international commercial banks would also be consistent with the degree of flexibility the Saudi government needs if it is serious in its long-term plans to make Saudia commercially viable before it is privatised.

After President Bill Clinton announced last year that the two US companies had won the order, it was widely assumed by bankers and aircraft industry experts that Saudia would confirm the full \$6bn order; and that the US's Export-Import Bank (Eximbank) would finance 85 per cent of the total in export credits, with additional financing to be arranged by Chase Manhattan and Saudi Arabia's National Commercial Bank.

Yet saw the difficulty posed for the Saudi finance ministry when faced with Eximbank's insistence on the blanket guarantee for the full \$6bn; even though, as a branch of the defence and aviation ministry, Saudia is entirely state-owned.

A new "serial" approach to Saudia's aircraft orders and financing would release the finance ministry from guaran-

teeing all but a portion of the \$6bn at any one time. "Eximbank would come in, but later and for a smaller amount," bankers said.

"The finance ministry chokes on the idea of giving a large blanket guarantee," one Saudi banker commented. "A step-by-step approach could unlock some of the barriers, and would fit in better with the progress the government is making to increase revenues, settle payments arrears, cut subsidies, and cover the budget deficit."

There has also been considerable official anger at the overbearing "take-it-or-leave-it" attitude displayed by Eximbank and US government officials. "The Saudis had some very nasty discussions with Eximbank," one banker said.

"The talks took a very bad turn. It seems Eximbank's message was: 'At the end of the day we are the lenders of last resort, and if you don't like our terms you can find other ways'. And that is what the Saudis have been doing for the last year. Hearing nothing, the banks started thinking the deal would not go through and many had struck it from their agendas."

The government's search "for other ways" will have been boosted by its prompt repayment on May 24 of the last part of its \$4.5bn 1991 international loan. This has enhanced its reputation for financial dependability. The government will also have been encouraged by last week's successful syndication of a \$700m loan, under a Saudi-US joint petrochemical venture. Bankers have described this loan as "an international vote of confidence" in the Saudi economy.

One fundamental question however remains: the extent to which the Saudi leadership is prepared to allow the private sector to own part of its national airline. Hitherto it has been regarded as a strategic asset second in importance only to the national oil industry. In Saudi Arabia, politics and high finance are inextricably linked.

thought that Saudi Arabia would make firm commitments for the full order. But by the end of last month, the emphasis had changed.

The Saudi decision to buy American aircraft - rather than, say, the European Airbus which was strongly lobbied for by the French and the Germans - was seen by Mr Clinton as Riyadh's thanks to the US for the Gulf war and his early intervention is said to have irritated the Saudis and been behind the delay.

"The intention now is to announce 'serial contracts' - a series of orders staggered over several years," one banker said.

The disadvantage of staggering purchases is that it adds to the \$6bn cost. Aircraft ordered in four to five years will cost more than they do today. But extended delivery schedules would give the government greater flexibility in the restructuring and privatisation of Saudia, including, it is suggested, the possibility of part of the \$6bn order going to a new airline - either to compete with Saudia on domestic routes or to act as the sole domestic carrier. This would leave Saudia free to concentrate on the profitable international routes, which would make it more attractive to investors.

Saudia does not publish its results, but aviation industry sources say it lost \$38m in 1993 on operating revenue of \$687m. While its results are thought not to have improved last year, it could break even or go into profit this year, after fare increases that followed last January's cuts in subsidies on domestic flights as part of the government's measures to reduce the budget deficit.

Fares went up 20 per cent on first-class domestic flights, 15 per cent on business class and 10 per cent for economy class. Bankers at an air finance conference in Dubai in January reckoned the increases could



Saudia's first civil aircraft: the DC-3 gift from US President Franklin Roosevelt to King Abdul-Aziz Ibn Saud 50 years ago

bring in an extra SR250m (\$367m) this year. Saudia has a reputation for inefficiency and for being a bottomless pit for state money. Up to 70 per cent of Saudia's flights are on subsidised domestic routes, with only a third on full-fare international flights but which provide two thirds of the revenue.

"I tend to discount the general impression of Saudia being a bloated loss-maker like other national airlines," said one Saudi banker. "Saudia actually helps the finance ministry in some areas."

"True, it benefits from cheap fuel supplies from state refin-

eries. But its payments are made on time; and what it gets in cheap fuel supplies is offset by what it owes by other state institutions whose payments are not so timely."

Traditionally Saudia has operated as a subsidised public service. Passengers, particularly on domestic flights, have benefited from cheap tickets. That for years was all Saudia could claim in its "sales pitch". In return passengers have put up with whatever conditions they found on board. If they are now to pay more, Saudia has to do something to make its services more attractive.

The first - and easiest - way to enhance their domestic and regional image is to replace an ageing fleet. The second is to introduce competition from.

The oldest aircraft in Saudia's 70-strong fleet are the Boeing 737s. Industry sources say these and the Lockheed Tri-Stars in the long-haul fleet have been in operation for 20 years. Some of its Boeing 747s also need to be replaced.

This suggests the airline will replace the international one-third of its fleet with some 20 of Boeing's latest 777-200s; or a combination of these and the stretched 777-300X which could take another 25 per cent pas-

sengers. The latter is still on the drawing boards.

These 777s would also conform to the government's perceived need to show off the latest and the best abroad. However, since they will not be ready for delivery for several years, Saudia could buy a handful of 767s and the Boeing 747-400. That would leave the 110-seat McDonnell Douglas MD-90 to replace most of Saudia's 737 fleet for domestic and regional services.

Although, according to industry experts there is a "significant difference" between catalogue and end-price, the 777-200s with engines and spares would cost \$150m-\$180m each, totalling some \$3bn. The cost of six 747-400s would come to some \$600m.

The catalogue price for each MD-90 is \$32m. Engines would add another 30 per cent, and spares another 15 per cent. This would total some \$1.4bn for 30 aircraft, a price which would rise depending on delivery dates and financing costs.

But the specifics of the pricing, or indeed the types of aircraft to be ordered, are less important for the future of the kingdom's economy and its civil aviation industry, than the prospect of wholesale privatisation of what up to now has been an indifferent state monopoly.

MORE THAN 25,000 BRITISH PEOPLE GO TO WORK ON AN AIRBUS



Levels of aid for poor nations fall to 20-year low

By Krishna Guha

Overseas development aid from the world's richest countries fell by \$5bn in 1993, the first significant fall in more than a decade, and now represents a smaller proportion of wealthy nations' GNP than at any time in the last 20 years, according to an independent report published today.

Even as the volume of aid falls, it is increasingly influenced by commercial and political concerns rather than the need for poverty relief, said the report, jointly published by the International Council of Voluntary Agencies, Eurostep and UK-based Actionaid. Agricultural protectionism, strategic concerns and desire to promote arms exports often contradict the stated goals of aid programmes.

The report, Reality of Aid, illustrates the gulf between promises made at the Copenhagen social summit earlier this year and actual aid flows.

In spite of longstanding commitments to the UN aid target of 0.7 per cent of GNP, the percentage fell in 14 of the 21 countries of the OECD's Development Assistance Committee, bringing the average down to 0.30 per cent from 0.33 per cent in 1992.

"Governments are in danger of giving up in the fight against absolute poverty," says

Mr Tony German, co-author of the report.

The agencies warn that this trend is likely to continue, particularly in view of efforts in the US Congress to cut aid by \$2bn. Mr Nigel Twose, director of Actionaid, said: "There is real danger of the US aid effort spreading." Canadian aid, for instance, will decline by 15 per cent in 1995/6.

The agencies acknowledge that private investment flows to the developing world rose substantially in 1993, offsetting cuts in official aid and increasing the total flow of resources from the developed world.

However, they argue that private investment, which is channelled to countries with immediate potential for growth, is not an adequate substitute for aid. While India, China and Indonesia received a large proportion of global private investment in the five years to 1993, sub-Saharan Africa, the world's poorest region, received only 1 per cent.

The report points out that aid itself is increasingly attuned to countries which offer promising opportunities for trade or, like those in Eastern Europe or North Africa, present security concerns. "Sub-Saharan Africa is in real danger of being marginalised," says Mr German.

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Pact on EU currency destroyed by premier's failure to tame right wing

Top ministers push for Emu referendum

By Robert Peston,
Political Editor

Senior cabinet members are pushing for a government commitment to hold a referendum on sterling's membership of a single European currency as the best way to end the dispute about European Union policy which is tearing the government apart.

The prime minister, Mr John Major, is yet to make up his mind on a referendum. However, he has made clear to colleagues that he is now less likely to move his EU policy in a more anti-European direction after the mauling he received on Tuesday at a meeting of Eurosceptic MPs from his Conservative party.

"You don't behave like that to a prime minister," said a senior minister. "He could not possibly trim his approach to Europe now. It would make his position untenable."

The angry criticism which Mr Major faced in the meeting undermines a pact reached last Thursday by a meeting of the political cabinet - a full cabinet meeting to discuss party affairs - that pro-European and Eurosceptic ministers would tell their supporters on the Conservative backbenchers to cease hostilities. "There was full and explicit support from both wings of the cabinet on the need to call a truce," said a minister. Now that had been thrown away.

Both the home secretary, Mr Michael Howard, and the foreign secretary, Mr Douglas Hurd, have come round to the view that a commitment to hold a referendum is the only way to draw the fire of fanatics in both camps of the European argument. They face opposition from Mr Kenneth Clarke, chancellor of the exchequer.

The UK will not be forced to decide whether to accept a single European currency during

An autumn challenge to Mr John Major's leadership of the Conservative party appeared virtually certain yesterday as MPs digested the implications of his bruising clash with Eurosceptic rightwingers on Tuesday. "There is now absolutely no chance that he can survive, because he has shown himself unable to give a lead and he has lost his authority," said a senior rightwinger previously loyal to Mr Major. There was widespread agreement that Mr Major's position was fatally undermined at the meeting by his inability to exercise authority. Several pro-European MPs look willing to back a leadership contest. One leftwinger, formerly a Major loyalist, said he would give his vote to any challenger who received the required number of nominations. "I'm fed up of waking every morning and hearing a steady drip-drip of bad news," he said. "The prime minister has just lost all sense of crisis management. The main thing now is to get someone who can avoid a Canadian-style wipe-out."

this government - with an election probably two years away. But ministers believe that by the beginning of 1997 there will be clear indications of which countries will merge their currencies and of the nature of preparations for monetary union.

At that stage, there will be intense pressure on the British government to indicate where it stands on joining. Senior ministers believe that only a commitment to hold a referendum on the issue will prevent the Tory party from splitting down the middle.

Eurosceptics want the UK to push for repatriation of EU powers back to national governments, leaving the EU in effect as only a free-trade area.

ILO delays action against union ban

By Robert Taylor,
Employment Editor

The International Labour Organisation pulled back yesterday from censuring the British government for outlawing trade unionism at its GCHQ communications and intelligence-service station 11 years ago.

The Geneva-based body said the government should be given a "final opportunity" to resolve the issue. It proposes to create an advisory mission to examine what should be done.

Mr Michael Portillo, the UK employment secretary, welcomed the ILO's decision, but said the government "remains convinced that the ban on national union membership at GCHQ is essential in order to safeguard national security".

Mr Portillo also accused the British Trades Union Congress of running a "politically inspired campaign designed to manipulate the ILO for partisan purposes".

In a prolonged and bitter debate yesterday trade union representatives at the ILO conference demanded that the British government should be punished with a "special paragraph" in the ILO's report for banning unions at GCHQ. This is the ultimate sanction that can be used against a country for violating labour standards.

In recent years Myanmar, the Sudan, Panama and Ecuador have received special paragraphs for abuse of workers' rights.

But a number of governments, notably France and Germany, said they were unwilling to support a "special paragraph" for the British government because of its behaviour over GCHQ was not a serious breach of labour standards.

The UK's strongest ally was the Indian government, which received a special paragraph last year for tolerating bonded labour. It supported the British government's ban on trade unionism at GCHQ.

The initiative for an ILO mediation mission came from the Dutch government, supported by South Africa and the United States.

Flat earnings growth applauded in City

By Gillian Tett,
Economics Staff

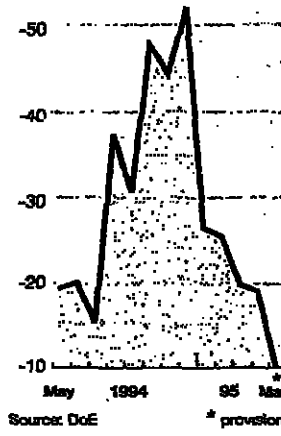
Average earnings growth remained flat last month, official figures showed yesterday. The data was greeted with joy in the City, where many economists had expected it to rise. Indeed, with earnings growth remaining very low by historical standards, economists said the data should give a powerful boost to the government's attempts to keep inflation low.

Mr David Coleman, UK economist at Canadian Bank of Imperial Commerce, said the figures were "very encouraging for the inflation outlook, with earnings growth stubbornly refusing to pick up".

However, he added that the main reason for this was not hard to find. "Despite the strong recovery last year, insecurity in the job market has remained rife," he said. "Hardly any day passes without some announcement of job

Unemployment

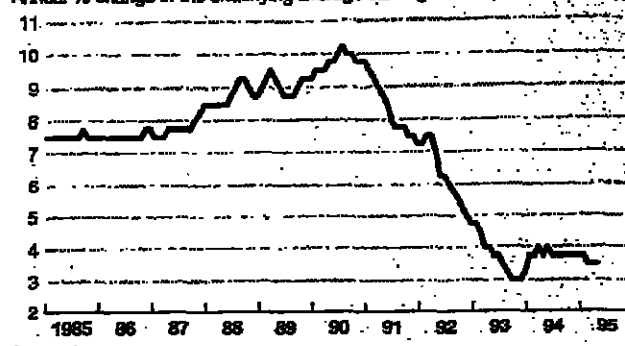
Change since previous month (%)



Source: DoE

Pay rises on a low plateau

Annual % change in the underlying average earnings index (whole economy)



Source: Datastream

below the level seen in the second half of last year.

The lowest level of earnings growth occurred in the service sector, where wages increased at an annual rate of 2.75 per cent - slightly higher than the previous month. Earnings growth in manufacturing was unchanged at 5 per cent, while

in the production industries it fell back slightly from 5.25 per cent to 5 per cent.

Unemployment fell in May at the slowest rate for 17 months, official figures showed yesterday. The rate at which people have been leaving the unemployment register each month has been slowing con-

tinuously since the start of the year.

The figures, which come amid signs that job growth has also fallen, provide fresh indications that the British economic recovery may be easing. The Department of Employment said that the number of people claiming unemployment benefit fell by a seasonally adjusted 10,000 between April and May, leaving the unemployment rate at 8.3 per cent.

Although this decline takes unemployment down to levels last seen in June 1991 - with a drop of 350,000 on the year - it was the smallest monthly decline since January 1994.

The Trades Union Congress is becoming increasingly concerned that the economic recovery is slowing down, our Employment Editor writes. Mr John Monks, congress general secretary, said yesterday that the latest employment figures were "dismal".

Ethnic minorities protest at change in business aid

By Simon Kuper in London

Ethnic minority organisations have suffered a drop in government funding since the Single Regeneration Budget was introduced last year, a report from the Black Training and Enterprise Group, a voluntary organisation, says today. The SRB includes 20 previously separate funding programmes worth a total of £1.4bn (£2.2bn).

The report focuses on bids for SRB funding in the Merseyside and the west Midlands areas of England. It says none of the seven "black-led" bids in the west Midlands won funding, while only one Merseyside bid mentioned any ethnic groups as main partners.

The report said ethnic minority organisations had had trouble attracting SRB funds because they tend to lack the funds and time to assemble the complex bids the process requires.

Mr Santino Deng, co-ordi-

tor of the Midland Refugee Council, said his council lacked the expertise to complete the compulsory business plan. It also found difficulty in submitting 10 copies of the bid of 30 pages each, as required.

The report says the municipal authorities and employer-led Training and Enterprise Councils, which lead most SRB bids in England and Wales, often avoid ethnic organisations as partners in the belief that they are unprofessional. Bid leaders either fail to consult them or consult them too late.

Mr Javed Bashir, vice-chairman of the Keighley Asian Consortium in northern England, said: "There's never been a translation of SRB leaflets into any of the minority languages. Many of the organisations are very much in the dark about what kind of process the SRB is." He said many found out too late to submit bids.

Farmers' co-operative wins 8% milk price rise

By James Harding in London

Milk Marque, the co-operative for farmers, yesterday said it had secured dairy producers an 8 per cent increase in the price paid for their milk in its first year of trading.

Dairy food processors, which have announced several thousand redundancies since the milk market was deregulated last year, have blamed Milk Marque's high prices for the turmoil in the industry.

For the first five months after it took over from the Milk Marketing Board, the former statutory monopoly, last November, Milk Marque reported pre-tax profits of £25.1m (£38.4m) on sales of £780.2m. The co-operative will pay £20.4m - or 0.7p per litre - as an end-of-year bonus to contributing dairy producers.

Although this resembles a dividend, no tax is paid on it because it amounts to a further payment for supply.

Added to the 24.7p already paid per standard litre, farmers have earned on average 25.45p per litre, which Milk Marque

says is generally 2p per litre more than under the board last year. Mr Chris Melchers, Milk Marque's finance director, said the 0.7p profit distribution was possible thanks to tighter control of operating costs, down to 0.3p per litre compared with an estimated 0.7p per litre when milk sales were managed by the board.

Mr Andrew Dare, Milk Marque's chief executive, defended the increases in milk prices as "a one-off correction" because prices had been suppressed under the Milk Marketing Board. Under their scheme the Dairy Trade Federation had been a monopoly buyer, keeping prices for milk in the bottom quarter of the European "league table".

Last year's price increase brought prices paid for UK milk into the top half of the table. In this year's bidding round, which starts when Milk Marque posts its benchmark prices next month, Mr Dare said he was "telling farmers to expect prices to stabilise".

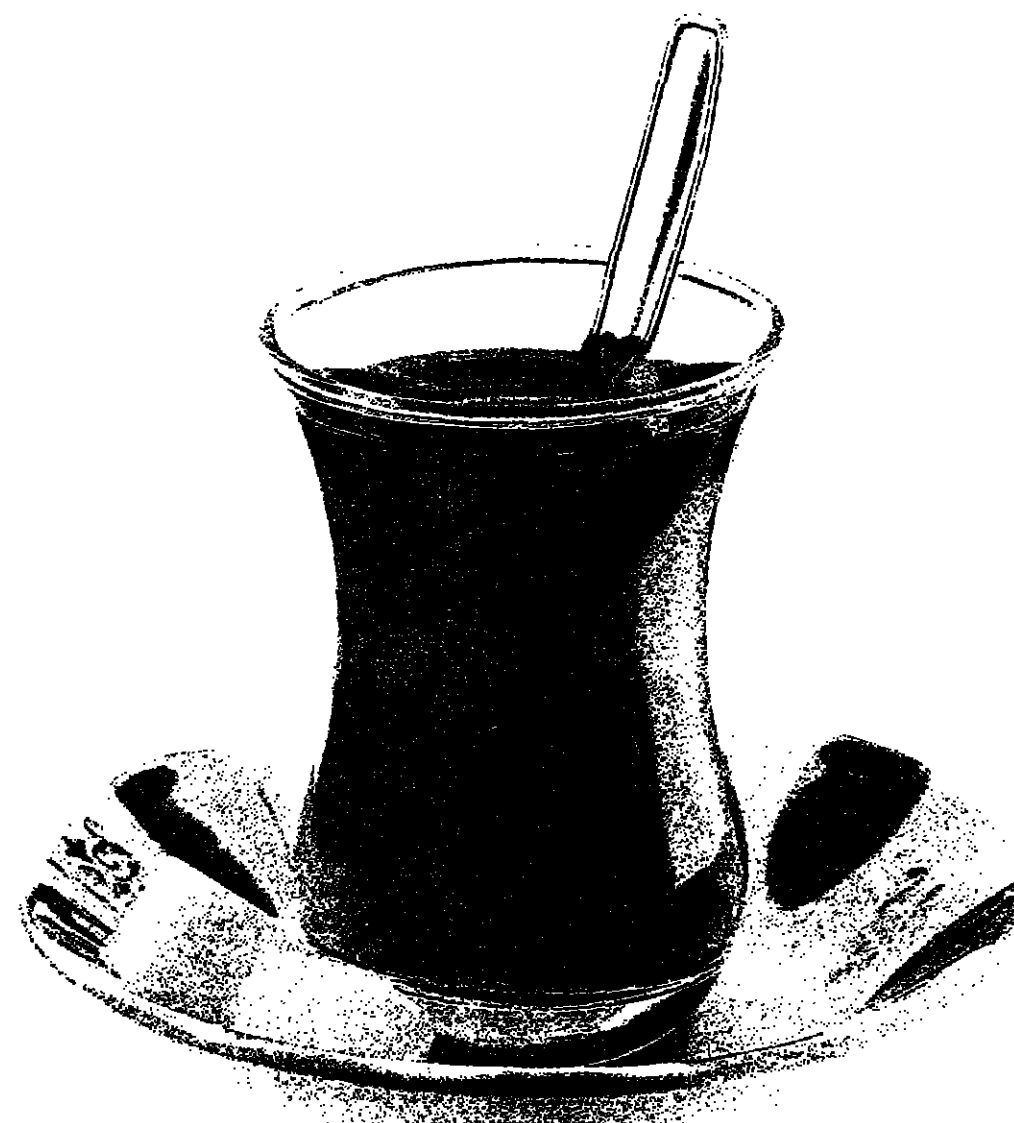
Milk Marque's exports to Belgium and France were evi-

dence, he said, that its prices were "internationally competitive".

"For the first time in 60 years, farmers have been able to work together in their own organisation to establish a fair market price for milk," he said.

Earlier this week Unigate and Northern Foods reported sharp falls in annual profits as a result of provisions for combined redundancies of some 4,000 dairy employees. They have argued that Milk Marque has abused its near-monopoly position, buying two-thirds of all raw milk in England and Wales to ratchet up prices by 11 per cent. The price rises have eroded margins, particularly on doorstep sales, already strained by a fall of almost 50 per cent in demand over the past decade.

The Dairy Industry Federation, the buyers' representative and successor to the Dairy Trade Federation, has asked the Office of Fair Trading to investigate the market with a view to a referral to the Monopolies and Mergers Commission.



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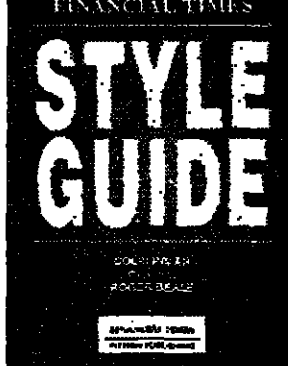
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Financial Times

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UK NEWS DIGEST

Banks agree to heed warning on size of bonuses

The City of London's leading investment banks promised to heed warnings by the Bank of England, the UK central bank, that the bonuses they pay to traders and other executives are too high. Mr John Manser, chairman of the London Investment Banking Association, said the central bank was right to remind the boards of companies and senior management about pay. "Remuneration excessively dependent on short-term returns may create a bias towards risk which is undesirable," Mr Manser, who is also managing director of Robert Fleming, said investment banks were addressing concerns about incentives by ensuring a component of pay which was linked to the long-term performance of the company. He was responding to indications of growing Bank of England concern about the perverse effects of some bonus systems. Mr Andrew Jennings, a bank official, said earlier this week the bank would prefer to see remuneration take account of the stability of profits, as well as their level.

Nicholas Denton and Gillian Tett

Chocolate bends for engineers



Chemical engineers at Cambridge University have invented a form of "flexible chocolate" that can be bent, twisted and tied into knots. Nestlé of Switzerland, the world's largest chocolate company, is interested in the commercial aspect of the process. Mr Malcolm Mackley and colleagues made their discovery using high-pressure injection equipment for plastics. They put solid chocolate chips into a barrel and forced the material through a nozzle at pressure described as being equivalent to having "a full-grown elephant standing on your foot". The chocolate emerges as a flexible string which gradually hardens over an hour or so. Confectioners could use the technology to make intricate chocolate shapes impossible with the conventional process of moulding melted chocolate.

Clive Cookson, Science Editor

Rail bid from France

Managers at South West Trains, one of the first three state-owned train operating companies to be offered for sale, have teamed up with a large French transport group to stage a buy-out of their business. The management team has agreed a joint venture with CGEA, a company which runs rail services over 1,000km of track in France as well as operating 5,000 buses. It employs 12,000 staff. This is the first time that a management buy-out team has joined forces with a commercial company to make a bid for one of the British railway franchises. The buy-out bid, which is due to be submitted by May 28, will include an offer to all employees to become partners in the business. SW Trains, which operates in south-west England, is the largest of the three franchises on offer in the first wave of privatisation.

Charles Batchelor, Transport Correspondent

TV revenues estimated

Commercial television in the UK, in all its forms, is worth more than £3bn (\$4.7bn) a year, says the Independent Television Commission which has combined the figures for the first time in its annual report. The ITC network, the direct commercial opponent of the BBC, had revenues of £2.1bn and was the largest operator. On an individual company basis, however, British Sky Broadcasting, the satellite venture in which Pearson, owner of the Financial Times, has a significant stake, had the highest income. The biggest stake in BSkyB is held by Mr Rupert Murdoch's News Corporation. Total advertising revenue for commercial television was £2.087bn last year, 10.9 per cent up on 1993.

Raymond Snoddy, Consumer Industries Staff

Winner loses: The home of a winner of the top prize in the National Lottery was burgled while he was in hiding at a secret address to escape publicity about his £11m (\$17m) prize. Police in the town of St Leonards in south-east England said an "untidy search" had been made of the flat belonging to Mr Mark Gardiner and a video recorder had been stolen.

Drugs crackdown: 12 people were arrested in simultaneous raids by 160 police in several towns in north-west England in an operation against an alleged international drugs and fraud empire. Drugs and equipment used in the manufacture of Ecstasy were found.

Gerry Adams says British are making unacceptable demand for 'surrender' of weapons by IRA PM to meet Clinton on Ireland deadlock

By John Kampthor at Westminster and John Murray Brown in Dublin

Mr John Major, the British prime minister, is expected to have a brief informal meeting about the Irish peace process with President Bill Clinton tomorrow. Mr Major will respond to US concerns about the apparent impasse in talks with the nationalist Sinn Féin party, the political wing of the IRA. The discussion, which will take place during the Group of Seven summit in Halifax, Nova Scotia, will be the first since talks in Washington in April when the president and the prime minister went some way

towards healing a rift over Northern Ireland policy.

Both sides acknowledged that Mr Clinton, in a speech at an Irish investment conference last month, moved closer to the British line that the IRA must begin "decommissioning" its weapons before full talks with Sinn Féin could begin.

That conference was dominated by a meeting and handshake between Sir Patrick Mayhew, chief Northern Ireland minister in the British government, and Mr Gerry Adams, Sinn Féin president. Since then, however, little progress has been made, with the UK government making clear it is for Sinn Féin to move on the arms issue. Mr

Mr Gerry Adams alleged in The Irish Times:

• There are approximately 16,000 members of the British army still involved in military operations.

• There are massive military encampments throughout the six-county statelet (Northern Ireland)...

• There are 13,000 heavily armed members of the RUC (the Northern Ireland police), a para-

military force which has acted as the armed wing of unionism and which is totally unacceptable to the nationalist community...

• The British government has made no move to deal with the reality that there are hundreds of political prisoners held in British jails."

Adams emphasised in a long article in yesterday's issue of the Dublin-based Irish Times that he had no intention of doing so, and blamed the British for the deadlock. Mr Adams said the British government was seeking a "gesture which would symbolise an IRA surrender". He added: "Sinn Féin cannot

deliver an IRA surrender; that is the reality. Surrender, or decommissioning, was never mentioned by the British during secret talks with Sinn Féin before the IRA ceasefire last August, he added.

"Had a surrender of IRA weapons been imposed as a precondition to peace negotiations, it is possible that there would have been no IRA cessation," Mr Adams' remarks were seen as his clearest riposte to British demands for movement on the arms issue.

US officials have attempted in a series of low-profile visits to Northern Ireland to persuade Sinn Féin to break ground over decommissioning. Mr Clinton has indicated that he wants to visit Ireland, north and south, in the coming months. But his officials have been unable to agree dates with the British and the trip is now unlikely to take place before November.

Both sides denied that the problem was anything more than a question of scheduling. "There is absolutely no political flavour about this," said a US official. Mr Clinton, he said, intended to visit Dublin, London and probably Belfast. "We have smoothed over the scar tissues," said a US official. "There is certainly concern at the pace of events, it seems that some aspects have reached an impasse, but this is not directed at the British."

Buyer of shipyard sells offshoot to Dutch group

By Chris Tighe in Newcastle upon Tyne and Ronald van de Krol in Amsterdam

The company which on Monday bought the main Swan Hunter shipyard in north-east England has sold its own nearby fabrication facility to a Dutch company. THC Holdings (UK), which bought Swan Hunter's yard a week before the entire contents were to be auctioned, has sold its main subsidiary, THC

Fabrication, to Heerema Fabrication Group. THC Holdings is based in Jersey, largest of the Channel Islands between England and France.

Mr Glen Wilson, THC's commercial manager, said it was pure coincidence that the yard purchase and the sale of THC's facility had occurred on successive days, but he conceded the timing was "bloody lousy". Negotiations with Heerema started almost a year ago, he said. "We had decided not to sell but they came back to us again."

Mr Wilson declined to disclose the sale price. Heerema Fabrication Group, based in Zwijndrecht near Rotterdam, said the company had paid "several tens of millions" of guilders. Mr Wilson, a key figure in THC's negotiations to acquire the Swan Hunter yard, said the sale of its own facility did not affect THC's plans for the yard. The deal would allow THC to concentrate on revitalising the shipyard to cater for the expanding new market for floating oil production

platforms. Heerema and THC are discussing possible future co-operation to develop Swan Hunter for the construction of floating production storage and offloading vessels. Mr Wilson said: "Rather than jeopardise the capability of the project, it will be further enhanced by Heerema's strength as a major contractor in our industry."

THC already has Dutch links - its managing director is a Dutchman, Mr Jan Veldhuizen, and its majority shareholder, whom Mr Wilson declined to name, is also Dutch.

Heerema Fabrication is part of Heerema Offshore Construction Group, a privately owned Dutch company. The main Heerema group, which is based in Leiden, is active in offshore construction and heavy-lifting shipping. It has a worldwide workforce of more than 4,000. THC's Harlepool facility will complement existing Heerema yards in Norway and the Netherlands.



Models courtesy of The LEGO Group

SPOT THE REFUGEE

There he is. Fourth row, second from the left. The one with the moustache. Obvious really.

Maybe not. The unsavoury-looking character you're looking at is more likely to be your average neighbourhood slob with a grubby vest and a weekend's stubble on his chin.

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Bernard Hooper is looking for the end of the commercial rainbow at Halfpenny Green airfield. In dishevelled second world war buildings in the countryside west of Birmingham, where the sound of light aircraft mixes with the noise his engines make, he is working through the problems of creating a new diesel engine for the small cars of the next century.

Around the world there are many small - and even not so small - engineering concerns and inventors exploring alternative combustion technologies and engine concepts. Almost without exception they have found the task of producing engines with a genuine competitive advantage over conventional petrol and diesel units both long and frustrating. No important car maker so far has seen fit to use one.

Despite this, Hooper and his backers believe their time may have come, on the grounds that even the current crop of small, high-revving four-stroke diesels fitted to cars such as the Ford Fiesta and Citroen AX will prove too big and heavy for forthcoming generations of ultra-lightweight small cars.

Size for size, current four-stroke diesels are inevitably heavier than their petrol counterparts because the block and cylinder head have to withstand combustion chamber compression ratios almost double those of a petrol engine. Add valves, camshaft and the camshaft drive components needed on any four-stroke engine, and fitting such a unit under the bonnet of the ultra-small cars of the future will undoubtedly prove tricky.

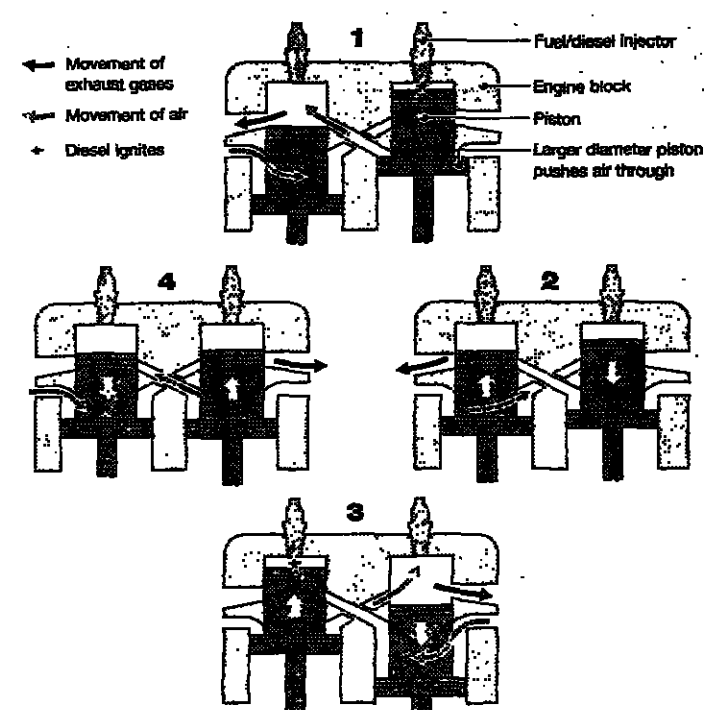
In addition, diesels are facing trouble meeting tighter exhaust emission standards planned for later this decade, and will almost certainly require an exhaust catalyst to do so.

Hooper, his son Peter and a small team of technicians maintain that all these problems can be overcome by the engine they are developing. It is a two-stroke with a stepped piston design which, in the ideal world that has so far failed to materialise for so many engine innova-

Stepping forward

John Griffiths and Paul Cheeseright on a possible breakthrough in two-stroke engine design

Blueprint for a new diesel engine



Source: Bernard Hooper Engineering

tors, they would like to see in mass production within 10 years.

The technical crux is to achieve compact, low-exhaust emissions, low fuel consumption but high durability and no diminution of performance.

There are several counts on which the Hooper engine might prove interesting to car makers. One is the very fact that it is a

two-stroke. This dispenses with valve gear and its weight and size penalties, as well as making the engine easier and cheaper to make. Providing twice as many firing strokes as a four-cylinder, the engine should also give smoother and relatively powerful performance.

But vehicle makers from Toyota to Volkswagen have already built prototype two-strokes in petrol and

diesel form. It is the Hoopers' extra ingredient, the stepped piston design, which is claimed to get round the big, age-old problem with the two-stroke that is partly responsible for unacceptably high emissions of oxides of nitrogen.

"The Achilles Heel of the two stroke engine is that all fuels go through the crankcase," says Hooper. "They are transferred to the cylinder. You cannot separate the lubrication from the combustion, so the oil ends up in exhaust. If you cut the oil down, the engine fails. The stepped piston engine separates the lubrication from the breathing, the combustion. So you

The stepped piston engine is of simple design with a small number of individual components. It has two diameters, the smaller being effectively a normal piston as used in a conventional ported two-stroke engine. The larger diameter section, at the bottom of the piston, acts as the compression piston. The intake charge is drawn into the annular space controlled by reed valves. These valves close automatically when the piston reaches bottom dead centre and is on the point of rising again. The intake is discharged through transfer ports into the combustion chamber of the other cylinder, scavenging exhaust gases in the process. This continues until the exhaust ports are closed by the rising piston and compression begins.

can use lubrication without causing emission problems."

Hooper, formerly chief designer of Villiers Engineering, has been working on stepped piston engines for nearly 30 years. The idea itself dates back to the first world war but, like many other alternative engine concepts, it went undeveloped for decades. Hooper, who holds a clutch of patents, licensed the technology to Norton Villiers, the motorcycle group, during the 1970s. Lately, he has worked on government contracts.

The stepped piston work is backed by the Dunlops, a Scottish

family with whisky interests. Since 1982, the Dunlops have held the licensing rights for the new engine. Nicholas Dunlop is now working full time for Stepped Piston Engines, which aims to see the engine brought into production. Dunlop's aim is to bring the engine into the automotive mainstream.

Dunlop talks of a co-operative arrangement with Bosch of Germany on injection systems, of talks with Lucas, the UK group with its own diesel injection system, of discussions with the piston products group of T & N, another UK group, and of some form of intellectual property sharing with AVL, the Austrian consultancy. Engine technology is a field where the industry likes to keep its lines of communications open.

But the experiences of other aspiring engine "breakthrough" concerns, such as Australia's Orbital Engine Company and Somex of the US, underline the challenge facing Hooper. The Orbital two-stroke engine concept has been

licensed to a number of car makers for several years, and as recently as three years ago Ford was indicating that there would be Orbital-engined Fiestas on the road by the mid-1990s. Emissions-related problems have pushed their possible introduction to near the end of the decade.

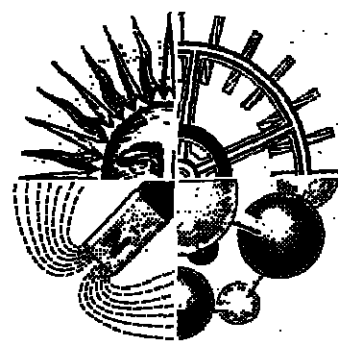
Orbital is already a large, respected company with its engines - in other applications such as marine - in current production. Yet it, too, has found that when it comes to cars and the complex legislation that surrounds them, it is a very long road indeed between concept and commercial production.

could lose out as a result of the government's growing emphasis on applied research and development and "wealth creation". Lord Butterfield summed up the committee's views: "We commend the government for putting in place the NHS R&D strategy but we are anxious about the operation of that process lower down the management line." More junior managers were still liable to regard research as a costly burden on scarce resources.

Clive Cookson

Medical Research and the NHS Reforms, HMSO, £18

Worth Watching · Vanessa Houlder



Moving the earth from the skies

The large, powerful equipment used to move earth is difficult to manoeuvre accurately. But a US-based consortium is combining computers, lasers and global positioning system satellites to develop highly precise controls.

Leica, the Swiss optical company, Caterpillar, the US earth moving equipment company, and Spectra-Physics Laserplane, a controls company, are developing computer-aided earth moving equipment. The two-year project is also being funded by the NASA Ames Research Center in California.

The equipment will use digital terrain maps in conjunction with precise information about the position and orientation of the earth moving blade, which will be supplied by GPS satellites and ground-based laser beams.

Leica: US, tel 310 7915300; fax 310 7916108

Culturing mammalian cells

Scientists in Switzerland have developed a technique for culturing mammalian cells which could make it easier to manufacture certain protein pharmaceuticals, such as monoclonal antibodies.

The Swiss Federal Institute of Technology in Zurich used genetic engineering to modify mammalian cells so they can grow without added protein or animal serum. The technique is being commercialised by Cytos Biotechnology of Zurich.

Cytos: Switzerland, tel 1 633 3170; fax 1 633 1051

Portable surface penetrating radar

Surface penetrating radar equipment has been used to detect

buried objects in applications ranging from murder investigations to finding plastic mines.

Advances in computing power have allowed Era Technology, a contract research organisation based in Surrey, to launch a compact version that can be handled by a single operator.

Applications of the Superscan equipment, which costs from £25,500, include surveying, pipe laying and archaeology.

The advantage of using radar over other techniques, such as ultrasound imaging, is that the equipment does not have to be in physical contact with the material being tested, which allows it to be scanned quickly.

Era Technology: UK, tel (0)1372 357000; fax (0)1372 357099

Telephone direct in the air

Jetphone, Europe's first direct air-to-ground telephone service, is being launched this month by BT and France Telecom.

The telephone has been installed on aircraft of British Airways, Air France, Air Inter and SAS.

The system uses digital radio links from the aircraft to ground stations, from which calls are routed via national telephone networks. The cellular technology is cheaper and simpler than the satellite-based equipment used on long haul aircraft.

Jetphone: France, tel 42217749; fax 42217300

Fluorescence labelling spectrum

A cyanine-based dye has been developed that completes the spectrum of colours available for fluorescence labelling - a method of identifying molecules in biomedical research.

The availability of the dye, which is being produced by Amersham International, will allow researchers to investigate several aspects of cells simultaneously by staining individual molecules using separate dyes.

The cyanine dyes have the advantage of operating in the red part of the spectrum, which avoids confusion with the natural fluorescence of cells which occurs in the blue and green part of the spectrum.

Amersham International: UK, tel (0)1494 542053; fax (0)1494 542058

Health warning for UK's medical research

The UK National Health Service has long been the envy of the world's medical scientists for its excellence as a research platform. That excellence is threatened by the government's market-oriented NHS reforms, the science committee of the House of Lords, Britain's second chamber, says in a report today.

"The market... is already doing serious damage to academic medicine and particularly to curiosity-driven research," the report says.

The Lords deplore the wall of accounting that now divides health-care from research. "We predict

that the cost of separating the scientist from the clinician will be high, both in transaction costs and in the creative interactions which will not take place at all because people cannot tolerate the artificiality of costing and accounting for them."

But the report takes a more optimistic view of the future, because

the government is beginning to implement an R&D strategy for the NHS, which compensates for the damage being done to long-term research by the short-term demands of the market.

The Lords say prospects for applied and clinical research in the NHS will be bright if the government implements the recommenda-

tions of last year's Culyer Report, as it has promised. This would ensure that the eight regional R&D directorates have enough money - about £500m or 1.5 per cent of the total NHS budget - to support research projects.

But the Lords are concerned that curiosity-driven biomedical research in university hospitals

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Cinema/Nigel Andrews

More well-dressed historical bio-tosh

Jefferson in Paris is a title with a horrible fascination. It is trying not to be "Young Jefferson" or in this case "Middle-aged Jefferson" - while promising us much the same bill of kitschy biographical goods. See the Famous Historical Person at work at play! Watch him fall in love! Hear him fashion his quotable quotes! Transplant him to exotic climes where he can interact with foreign manners and fabulous backdrops!

Ever since Zeffirelli's lavishly upholstered *Young Tom Sawyer* (1988) sank without trace, taking with it Elizabeth Taylor and the entire Rome Opera company, film-makers have been wary in handling potential bio-tosh. But is wariness the answer? In treating as carefully as director James Ivory does here, flanked as ever by producer Ismail Merchant and screenwriter Ruth Prawer Jhabvala, he still provides tosh - it is merely well-mannered tosh.

Ivory's Thomas Jefferson (Nick Nolte) is a mature man with a deceased wife and grown children. He has already written the American Constitution. And judging by Nolte's crotchety, impassive performance - eyes gazing into the distance, features narrowly creased - he has just finished sitting for his Mount Rushmore carving.

Unfailingly majestic to the eye, the film is hopelessly sedate to the mind. Like many historical films it tries to lob life in from the edges, aware that the centre may be seriously stiff with myth. So for 2 1/2 hours we have bits of eating, ballooning, theatregoing, and court manners. We meet Dr Mesmer, a Rasputin to the court of Louis Seize. We have dinner with Dr Guillotin, and meet his contribution to human cuisine (the demon-

strates for us with a scale model and an asparagus. And we have the first stirrings of *les événements de 89*: king to messenger, "Is it a revolt?" messenger to king. "No, it's a revolution."

These surrounding bits of colour only emphasise the monochrome people in the middle. Jefferson's private life wanders willy between plots: from his daughter's consignment to a Catholic convent to his romance with painter Greta Scacchi. Since Scacchi offers

JEFFERSON IN
PARIS
James Ivory

RICE PEOPLE
Rithy Panh

BAD BOYS
Michael Bay

SILENT FALL
Bruce Beresford

FUN
Rafal Zielinski

only an ironic sipper for a characterisation, we are not surprised when she in turn is sidelined for a pretty black slave girl (Thandie Newton) who will go on to bear - the years-later framing story tells us - small, coffee-coloured Jeffersons.

Almost none of this makes any impact on us at all. We have to ask: would Ivory have made this movie if it were not about a Famous Historical Person? Since the giant irony inherent in the contradiction between Jefferson's championing of democracy and his slave-owning conservatism, while noticed, hardly seems to detain our film-maker, we suspect the only reason we are watching

"Jefferson in Paris", rather than Smith or Pooter or A.N. Other, is historical group-ism. Like many bio-pics - certainly like all bad ones - this film ends up as little more than two hours of costumed autograph-hunting.

There are no stars or celebrities in *Rice People*, a French-Cambodian rural drama set in a rice-starved village. First-time director Rithy Panh may have failed to secure Greta Scacchi for the lead role of a peasant mother driven mad by being her family's sole worker-breadwinner husband has died from a poisoned thorn; crabs and snakes terrorise the paddies; but he has a powerful story, a grimly lucid performance by Peng Phan - first hitting the bottle and then being caged for her safety by fellow villagers - and an immunity to facile agitprop.

Since the Cambodian-born film-maker's own family suffered under Pol Pot, *Rice People* could have been a thinly veiled broadside against the Khmer Rouge. Instead the red menace is confined to a couple of dream sequences, commenting on the other real/surreal images that frighten the film into poetry. A spectral owl, a cobra, a television star, Will Smith, and a slow, unblinking, elemental naturalism, *Rice People* tells its story with an honesty at once deadly and hauntingly oniric.

Elsewhere Hollywood is in full cry, readying itself for the summer silly season. In *Bad Boys* two young black cops run around Miami playing Mutt and Jeff while the city disappears into flames and car chases. Played by two American television stars, Will Smith and Martin Lawrence, our heroes must protect a beautiful murder witness (Tea Leoni)



Majestic to the eye, but sedative to the mind: Nick Nolte and Thandie Newton in 'Jefferson in Paris'

from dangerous hoodlums. Meanwhile ex-commercial director Michael Bay shuffles his coloured filters, and an escaped music system with runaway volume control seems to be roaming the auditorium.

The film is so formulaic that we can only suppose it was dreamed up over a power breakfast: even a power eavesdropper creeps in only in the subplot which has the two men swapping identities, so that the girl thinks the married one is single and the single one is married. This may not sound hilarious, but it produces one or two comic complications and in *Bad Boys* we are grateful for anything.

In *Silent Fall* psychiatrist Richard Dreyfuss is asked to mine the mind of an autistic murder witness. Nine-year-old Tim saw his parents hacked to death in their bedroom. "Give me a murderer, Jake," the Sheriff asks Dreyfuss, "or I'll have to use Harlinger's magic potion on the boy."

Harlinger? He is a drug-happy rival shrink, muggingly played by John Lithgow as if he has wandered in from another film. But then every one behaves here as if they have wandered in from another film: pugnacious Dreyfuss from previous shrink duty on *What About Bob?*, scowling Linda Hamilton (as his wife) from Terminator employment, and director Bruce Beresford

from a career that has seen-sawed between the ridiculous (*King David*) and the modestly sublime (*Tender Mercies*, *Driving Miss Daisy*).

Here, as ineffectual suspense scenes jostle with advanced psychobabble, we could be in a bad TV movie. "Echolalia" is the jargon piece of *resistance* provided by debut screenwriter Akiva Goldsman (son of two child psychiatrists) - a condition which in the boy takes the form, the film tells us, of imitating junk television. The condition is obviously infectious. *Silent Fall* falls somewhere between Barry Mason and a "problem of the week" drama. Rafal Zielinski's *Fun*, from Canada, tries hard to break the

murder movie mould. Two girls (Alicia Witt, Renee Humphrey) are arrested for the senseless, "fun" killing of an old lady. Alternating scenes are shot in documentary-style black-and-white (present) and colour (past) as we time-shift between the girl's arrest and interrogation and the events leading to the murder.

At worst the film plays like a sorority night *Natural Born Killers*: an all-girl sortie into exploded style and imploded morality. At best - whenever it slows down - it shows the grimmer, unfunny side of that "efficiency" in the face of violence which Messrs Stone and Tarantino have found such an intoxicating giggle.

Obituary Arturo Benedetti Michelangelo

There was no greater perfectionist than the Italian pianist Arturo Benedetti Michelangelo, who has died in a Lugano hospital at the age of 75. He was one of the supreme pianists of our times, but his uncompromising approach to his art made him an introvert, a man who regarded public performance with extreme distaste. The rarer his performances, the more brouhaha they generated - of the kind Michelangelo hated. He became increasingly reclusive, and gave his last recital in 1992 in Zurich.

Perfectionism was the key to Michelangelo's greatness. He had the highest possible artistic goals, and he pursued them with the utmost skill and dedication. He was an interpretative fanatic, giving everything the importance and shape he thought it deserved. It was a very planned style of playing, but it was planned to the highest degree of musical and technical perfection.

Anyone lucky enough to have attended a Michelangelo recital or concerto performance is unlikely to forget it. First, there was the element of suspense surrounding any Michelangelo appearance, because he was a notorious canceller - calling off at the last moment or even interrupting a recital because of some perceived disturbance. Then there was his platform persona - wandering towards the piano as if still in two minds about cancelling, reluctant to acknowledge his audience, and bearing a permanent expression of weary melancholy.

But the music itself cast an entirely different spell. His playing was characterised by a beautifully polished sound, great clarity of execution, strict fidelity to the composer, and a high degree of awareness of harmonic subtleties. That is why he was so successful with Schumann, Debussy and Ravel; his *Gaspard de la nuit* was matchless. He was not the most memorable of Chopin interpreters, because he was not one for freedoms, excesses, vibratos, or any outburst of spontaneity - the very opposite of a Rubinstein. Michelangelo was an ascetic, and he played the way he was - with a seemingly unshakable aristocratic reserve.

Born in Brescia on June 5 1920, Michelangelo studied at the Milan Conservatoire and won the international piano competition at Geneva in 1939. His performance of Beethoven's Fifth Piano Concerto at La Scala, Milan shortly after the end of the war was judged a sensation, and it launched his international career. He made his London debut in 1946, and continued to perform there irregularly until 1990. His concerto performances were even rarer than his recitals, because he would only collaborate with a handful of conductors - among them Celibidache and Giulini.

He lived in southern Switzerland, and taught privately and at the conservatoire in Bolzano. He leaves a small legacy of recordings, chief among them the video of his 1982 London performance of the Ravel G major concerto - which he also recorded memorably for EMI in the early 1960s.

Andrew Clark

Dance/Clement Crisp

Featherstonehaughs 'Go Las Vegas'

It proved a glum evening at Sadler's Wells on Tuesday when Les Anderson, told the six men of her Featherstonehaughs troupe to "Go Las Vegas". The invocation of this hotspot is improbable. What we see is a tribute to Grimsby, with a nor'easterly blowing hard and not too much going on after the shops close on a January evening, so dreary and bleak the enterprise.

Whatever else it may not be - a centre of puritan values, an anthem - Las Vegas Anderson's prodigious vitality and dazzling skill in the stage shows that are not quite drenched by the rattle of fruit-machines. Ancient Hollywood performers - everything in sight winched up by the surgeon's knife - go vivaciously through their former paces and apparently rediscover their youth. Here is the apotheosis of glitz, stunning presentation, even dress make-up to seem the gold of the theatre. And what does Miss Anderson offer? Dull, repetitive routines (the word was

never more apt) performed by a sextet of none-too-limber chaps whose dead-pan manner, like Miss Anderson's production, makes them seem lobo-tomised.

They boast check suits, novocained manners, and the abstracted air of men who have been interrupted in some vital activity - watching paint dry, perhaps - in order to caper on stage for 80 relentless minutes (and no interval). There is loud and unappealing accompaniment owed to Steve Blake and Drostien Madden, interspersed with recordings of Las Vegas performers making deeply humble remarks about the wonder of appearing before an audience of gamblers.

Miss Anderson's final coup de théâtre is the fact that the Wells' audience are issued with little torches which they are required to shine at the stage during the closing moments of the piece so that the men's silvery suiting shall glow. Such theatrical wit has probably not been seen since the premiere of *Gammer Gurton's Needle*.

Izhak Perlman is celebrating his 50th birthday by giving four concerts over eight days, offering a selection from his repertoire of violin concertos with the Philharmonia Orchestra. It is a fine opportunity for fans, but not an ideal setting for works of this sort which acquire a sense of occasion from being heard individually, as highlights.

Still, last Saturday, Beethoven's two short Romances for violin and orchestra made effective curtain raisers for his Violin Concerto. With Lawrence Foster conducting, the Romances were kept well on the move and held rather less rapture than ideal. In the Concerto, Perlman's tone was sweet, his style chunky but also just a bit too impersonal. I was not moved until attention was focused on his technical mastery in Kreisler's cadenza in the first movement, and Perlman brought off the busy fury of the less intellectual cadenza in the finale brilliantly.

On Tuesday, with Yoel Levi conducting, Perlman played Mozart's Concerto No 3 in G and Brahms' Concerto. Mozart's piece is best remembered as a teacher and writer of text books, yet his music for *The Incredible Flutist*, originally performed as a ballet in 1938, is far from academic. The concert suite from it offers a string of

entertaining genre pieces, including a rowdy depiction of a circus arriving in which the orchestral players suddenly break out shouting, one of them even snapping like a dog. Piston's suite was mirrored at the end of the concert by Gershwin's still noisier *American in Paris*, whose jump-cut discontinuities were confronted frankly by the conductor Andrew Litton. The least descriptive music of the evening was the Concerto for clarinet, string orchestra, harp and piano, which Aaron Copland wrote for Benny Goodman. The wide-arched pastoral phrases of its first movement contrast satisfyingly with the breezy synopses of the second, and Emma Johnson, playing from memory, pitched into both with obvious feeling.

The style of personal address was strong, too. In Sylvia McNair's lovely, crystal-clear singing of Samuel Barber's *Knoxville* - a bitter-sweet reverie broken by a central interlude depicting the jarring sound of the streets.

Concerts in London/Adrian Jack Celebrating Perlman, American composers and rare Strauss

The American character of all these works is diverse yet unmistakable. The only piece that might have been European was *The White Peacock*, by Charles Griffes, who died in 1920 at the age of 35. Griffes could be called a musical counterpart of Whistler - a connoisseur of subtle half-lights, and Andrew Litton showed a nice sense of visual suggestion by relinquishing his baton just to mould the sumptuous murmurs of Griffes's music.

The following evening the 23-year-old American Gil Shaham was the very slick soloist in Prokofiev's First Violin Concerto with the London Symphony Orchestra under André Previn. If Shaham's tone was lubricious, his articulation and tuning were absolutely certain; the performance was just a bit short on the final element of devility because of Previn's tame accompaniment.

But the orchestra had its fun in Richard Strauss's *Symphonia Domestica*, probably the least often performed of all his orchestral showpieces, which inflates the daily events in the Strauss household out of all proportion to their very ordinary character. If the effect is mock heroic, Strauss's intention was almost certainly not ironic, though enjoyment of his virtuoso juggling of ideas and forms can be enhanced by spotting the echoes and pre-echoes of his other works. One of the most interesting sections in *Symphonia Domestica* is the least literally descriptive, for it represents sleep and the muddled images of dreams. Later, towards the end of the work, there is a succession of sure-fire tricks - multiple horn flourishes, a trumpet fanfare tossed high over the full orchestra, a shocking silence, which is then broken by all the violins swooping in unison - which are all thrilling. They were all brought off with bravura here, and the players looked justifiably proud and pleased at the end. They performed two more Strauss extravaganzas, *Don Quixote* and *An Alpine Symphony* on June 15 and 18.

Further Perlman concerts tonight and Saturday. The Royal Philharmonic Orchestra's concert was sponsored by American Airlines.

INTERNATIONAL ARTS GUIDE

AMSTERDAM

CONCERTS
Het Concertgebouw Tel: (020) 671 8345

● Royal Concertgebouw Orchestra: with violinist Jaap van Zweden. Zoltan Pesko conducts Rijn and Stockhausen; 8.15pm; Jun 17

OPERA/BALLET
Het Concertgebouw Tel: (020) 671 8345

● The Magic Flute: by Mozart. A semi-staged performance conducted by John Eliot Gardiner and with the English Baroque Soloists and Monteverdi Choir; 7.30pm; Jun 20

Het Muziektheater Tel: (020) 551 8922

● Die Meistersinger von Nürnberg: by Wagner. Hartmut Haenchen conducts the Netherlands Philharmonic Orchestra and soloists Jan Hendrik Roetering and Siegfried Vogel; 5.30pm; Jun 18, 20

BERLIN

CONCERTS
Konzerthaus Tel: (020) 309 21 02/ 21 03

● Berlin Symphony Orchestra: Kurt Sanderling conducts Beethoven and Mozart; 8pm; Jun 15, 16, 17

● Catalan Festival: soprano Victoria de los Angeles is accompanied by the Guitar Quartet from Barcelona to play Guerrero, Sor, Giuliani and Montsalvage; 7.30pm; Jun 18

● Radio Symphony Orchestra Berlin: with soprano Celine Lindley, alto Jane Henschel and tenor Donald George. Rafael Frühbeck de Burgos conducts Mendelssohn; 7.30pm; Jun 18

Staatsoper Unter den Linden Tel: (030) 200 4762

● Berlin State Orchestra: with pianist Daniel Barenboim, soprano Laura Aikin and mezzo-soprano Katharina Kammerhofer. Pierre Boulez conducts Wagner, Bartók and his own compositions; 4pm; Jun 17, 18 (11am)

OPERA/BALLET
Deutsche Oper Tel: (030) 34384-01

● Der Rosenkavalier: by Strauss. Conductor: Jiri Kout, production by Götze Friedrich; 7.30pm; Jun 15

● Martha oder Der Markt zu Richmond: by Friedrich von Flotow. Premiere conducted by Sebastian Lang-Lessing and produced by Winfried Bauernfeind; 7.30pm; Jun 16

● Onegin: music by Tchaikovsky. Premiere at this venue, choreographed by John Cranko, produced by Reid Anderson and Jane Boume; 5pm; Jun 17

BRUSSELS

CONCERTS
De Munt/La Monnaie Tel: (02) 218 2211

● Juliane Banse: soprano accompanied by pianist Wolfram

RIEGER; 8pm; Jun 16

● The Musicians of the Louvre: Marc Minkowski conducts Clarke's *Clarinets*; 7.30pm; Jun 15, 18 (3.30pm)

● Reigen: by Boesmans. A new production conducted by Sylvain Cambreling and produced by Luc Bondy. Soloists include Pia-Marie Nilsson, Doug Jones and Ezbieta Adam; 7.30pm; Jun 21

OPERA/BALLET
De Munt/La Monnaie Tel: (02) 218 2211

● The Masked Ball: by Verdi. Conducted by Antonio Pappano and produced by Guy Joosten. Soloists include Franco Faraña/Richard Margison, Edouardo Tumbayán/William Stone and Elena Zarembo; 8pm; Jun 15, 17, 18 (3pm), 20

COLOGNE

CONCERTS
Kölner Philharmonie Tel: (0221) 2801

● Berlin State Orchestra: with pianist Daniel Barenboim, soprano Laura Aikin and mezzo-soprano Katharina Kammerhofer. Pierre Boulez conducts Debussy's "Trois Nocturnes", Bartók's "Concert for Piano and Orchestra" and his own "La Feuille Nuptiale"; 4pm; Jun 17, 18

● Radio Symphony Orchestra Stuttgart: with violinist Mario Brunello, Gianluigi Gelmetti conducts Ravel, Haydn and Petraschi; 8pm; Jun 21

FRANKFURT

OPERA/BALLET
Oper Frankfurt Tel: (069) 23 60 61

● Lady Macbeth of Mtsensk: by Shostakovich. Conducted by Guido Johannes Rumschütz and produced

by Werner Schroeter. Soloists include Valeri Alexeev, Ryszard Karczewski and Christian Cleinsch; 7.30pm; Jun 15, 18 (3.30pm)

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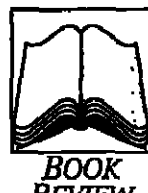
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The 'outsider' version of history



I suppose it is inevitable that anyone writing their memoirs is bound to indulge in a certain rewriting of history. This book is no exception. Baroness Thatcher felt a number of things must be put right by writing, in typical spirit it never dawned on her that her interpretation might be wrong.

All through her political career she appears to have been in opposition. "The inevitable loneliness of power has been exacerbated in my case by the fact I so often had to act as a lone opponent of the processes and attitudes of government itself," she says. "In the government I myself headed, I was often portrayed as an outsider." I dare say a large number of close colleagues will remember the occasions when she talked of government or party policy as if it had nothing to do with her.

As shadow employment spokesman during the years when she led the Conservatives in opposition between 1975 and 1979, I had many disagreements with her over the conduct of policy on the trade unions. The party's defeat at the polls in 1974 had been largely over the issue of trade union power after the debacle of the Industrial Relations Act. I felt we must be careful in our commitment to legislation and to the more normal Conservative reaction of union bashing. Margaret was in favour of this approach just so long as it did not exclude her from talking passionately about the freedom of the individual and abhorrence of the closed shop and hence union recognition. In view of what she says in the book about our relationship, it is more than a little surprising she kept me in the shadow cabinet at all, let alone gave me a place in the 1979 cabinet.

As ever, she was more cautious in her actions rather than her words. The influence of other more experienced shadow cabinet members counted for more than the more strident views of ideological allies such as Sir Keith Joseph.

Her views on the level of

THE PATH TO POWER

By Margaret Thatcher
HarperCollins £25.00, 656 pages

public expenditure were very strong. She is at pains to describe the mistaken policies of all postwar UK governments, particularly Conservative ones which should have been known better. She is contemptuous of the records of two of her predecessors: Harold Macmillan and Edward Heath.

Yet in the Heath government she and Sir Keith Joseph were not only the big spenders, they constantly demanded more. She recounts with understandable pride how she persuaded both Edward Heath and his cabinet to give her "almost everything I wanted for the school building programme".

The second part of the book purports to deal with the period after she ceased to be prime minister. In fact, it is much more an account of her well-known views on a range of issues such as Bosnia, the Maastricht treaty, sterling's withdrawal from the Exchange Rate Mechanism, and public expenditure.

On the European Union and Maastricht, she states she "has fought many battles", but fails to admit that in the end she lost most of them. I remember her saying she would not rest till the Common Agricultural Policy was destroyed, but 16 years later it is still very much alive.

Maastricht she terms a treaty too far. However, her record suggests she would have accepted the treaty at the end of the discussions - and most probably won fewer concessions than John Major, because of her stridency.

She relaunches the idea of the North Atlantic Free Trade Area to encompass North America and Europe including the eastern European states. The knowledge that neither the US nor our European part-

ners are interested is no deterrent and one is left with the overwhelming impression that she is returning to her anti-EU posture.

However, despite all my disagreements with her over policy, I believe she handled the difficult task of leader of the opposition with skill. She always displayed great loyalty and consideration to her secretaries, nannies and friends - as also to her colleagues in the shadow cabinet, only a few of whom were her supporters.

Her convictions were always strong and her capacity to absorb briefs down to the minutest detail phenomenal. I never knew her come to a meeting without a sound knowledge of the subject under discussion. The problem was much more one of restraining the urge to let her off the paper had finished.

I found the account of her childhood and upbringing most interesting and rather moving - and much too short. But it is possible to understand much better what gave her the ambition and the convictions to succeed and to become the longest-serving prime minister this century. Her love for her husband, Denis, her husband, shows through in chapter after chapter and no one will gainsay how lucky she was to have him, and how well he has played his part.

I presume this is the last volume of her memoirs, and now history must be left to decide the weight of her considerable contribution. Lady Thatcher believes socialism has been defeated once and for all and this is her proudest achievement. I hope she is correct, but in her praise for Tony Blair, the Labour leader, she is not just extolling the virtues of One Nation Conservatism. It would be an odd twist of fate to create a new One Nation party when you have destroyed your own.

Lord Prior

The reviewer was a cabinet minister under Sir Edward Heath and Lady Thatcher. He is chairman of the General Electric Company, the defence and electronics group.

The link between money and prices is about the oldest proposition in economics. But the correct statement of that link has proved elusive and the distinguished contributors to a new symposium differ widely. (*The Quantity Theory of Money*, Edward Elgar, £39.95).

The contributions begin with an account by Walter Eltis of how John Locke, the English philosopher, used the Quantity Theory to put England on a sound money basis 300 years ago. Among other contributors, Mark Blaug writes on the logical issues raised, and Geoffrey Wood draws morals from the very limited success of the 1980s monetarist experiment.

The original Quantity Theory of money was designed for a gold standard world. It first flourished in the 18th century when gold and silver discoveries in the new world led to price inflation in Europe. It was used to denounce the notion that a nation's wealth depended on the amount of precious metals it had.

At a national level, an increase in the amount of gold or silver would lead out to the rest of the world through the balance of payments. At a world level (and the world was for practical purposes France, Spain and Britain), a doubling of the amount of gold would eventually be dissipated in an approximate doubling of prices measured in gold units.

The moral was that a country wanting to prosper had to rely on its own industry, enterprise and thrift rather than on ingenious devices for getting hold of more bullion. The theory also cautioned against policies such as issuing large amounts of paper money or clipping coins, all of which amounted to the imposition of an inflation tax by the sovereign on the people.

The same logical apparatus could be applied in the gold standard world of the 19th and part of the 20th century. It is only since the last links with gold were broken that monetarism has come into its own as a proposal for controlling the amount of fiat money (that is manmade currency not convertible into anything intrinsically valuable).

This whole branch of thinking could be made less arcane and brought nearer to ordinary experience by asking a few simple questions. How much is a household likely to spend? The instinctive response of many will be: "It depends on how much money it has."

This is apparently game, set

ECONOMIC VIEWPOINT

Achieving stability

By Samuel Brittan



and match to the monetarists. But explore a little deeper. By this answer, people do not literally mean how much cash and bank deposits they hold. They are more likely to mean some combination of their regular income and their wealth in the form of houses, financial assets and so on.

The monetarist then has a more difficult task - to show that large changes in nominal income or wealth ultimately depend on the behaviour of the banking system, which is in turn under the influence of official policy. This is more difficult, but possible.

More needs to be said. Surely if people are optimistic and full of animal spirits, they will try to borrow more and spend more, for any given level of income and wealth. If, as now, they feel pessimistic and depressed, and aggressively disposed towards business, they will fight attempted price increases by shopping around rather than by borrowing from banks. Why deny that this mood music has influence?

What monetarists need to assert is that central banks can stop either mood from going to excess. The power arises from the fact that commercial banks tend to keep reserves with central banks. The latter can by their own lending and borrowing operations increase or decrease the quantity of these reserves and thus increase or reduce the ability of banks to lend.

Where there is a danger of a deep recession it may not be enough to supply commercial banks with reserves on easy terms. There may be a case for scattering money to the people, either by dropping it from helicopters, as Milton Friedman posited, or by buying it in the ground and leaving it to the profit motive to dig it up, as Keynes once suggested.

Is there any difference between the quantity theory of money and monetarism? The quantity theory conjures up a vision of rustling academic gowns and long time series

charted on blackboards. Monetarism suggests Tory wets shaking their heads at the excesses of early Thatcherism without any particular ideas

If the supply is sensibly regulated inflation will still fluctuate but money will retain its value

of a low and fixed annual percentage increase in some chosen measure of money. Wood argues convincingly that the huge monetary changes of recent years, such as the abolition of exchange controls and direct controls on bank lending, were bound to affect monetary behaviour and distort any attempt to guide policy by a simple rule.

The quantity theory is basically less mechanistic than monetarism. Friedman, in his earlier and best academic work, emphasised that the relation between money and

prices was not only subject to lags, but held good only on average. The implication surely is that if the money supply is sensibly regulated there will still be quite pronounced fluctuations in inflation from year to year, but money will retain its value over a period of years. Today's pound or Ecu will not be very different from the pound or Ecu in a century's time.

Wood uses this argument to give a very condensed warning about the present fashion for narrowly drawn up short-term inflation targets. Year to year stability in the rate of inflation may not be possible or even desirable: thus present fashions in inflation targets may come to the same grief as the strict monetarism attempted a decade ago.

At least the signals then point in the right direction. Policy is aimed very severely against inflation in times of growth and becomes stimulatory in a recession. But the authorities do not have to answer impossible questions such as "Is excess capacity above or below the safety level?" or "Is unemployment above or below the equilibrium level?" Nor is there any reason why central bankers should go mechanically by the past. They can, for instance, take into account such forward-looking information as they can find from financial indicators such as bond rates, commodity prices and exchange rates.

The approach through nominal GDP has so far not won favour with policymakers because it has been treated as another technocratic gimmick and not as an intellectual tool for use in the medium term. But a fresh start is never less required with less accumulated intellectual baggage and more openness to common sense.

LETTERS TO THE EDITOR

Number One Southwark Bridge, London SE1 9HL

We are keen to encourage letters from readers around the world. Letters may be faxed to +44 171-873 5938 (please set fax to "line"). Translation may be available for letters written in the main international languages.

Subsidised art leads to narrower choice

From Mr David Sowers.

Sir, Michael Prowse omitted one argument against subsidies for the arts in his assault on this misuse of taxpayers' funds ("Shakespeare didn't need a subsidy", June 12). Subsidised art tends to drive out unsubsidised art: so the choice of art available to the consumer will be narrowed. The development of the arts is all the more likely to be determined by the tastes of those who dispense the subsidies, and the commercial sector becomes increasingly limited to popular works that the subsidised sector spurns.

In the UK, new productions of plays are increasingly financed, wholly or in part, by the subsidised sector because it has access to free money, and partnerships between commercial and subsidised companies therefore increase the potential profitability of any venture. The beneficiaries from the system claim that this development shows that the theatre cannot exist without subsidies, although it merely demonstrates that businesspeople use the cheapest source of capital. Subsidised companies can thus

largely determine what plays get produced in the UK.

In the US, subsidy does not have this influence over the arts. But the publicly supported television that Michael Prowse envisaged was blamed for the failure of the privately financed arts channels a decade ago: few viewers were willing to pay the substantial subscriptions demanded by the arts channels when public service television was free. In the UK, the existence of the tax-financed BBC similarly hampers the development of commercial arts channels; and the commercial services offer something different from the BBC.

Intellectuals on both sides of the Atlantic can then agree that commercial television is appalling, and only state finance can provide a decent service. But eliminating state finance might provide them with a better service - as well as enriching the taxpayers. David Sowers, 10 Seaview Avenue, Angmering-on-Sea, Littlehampton, West Sussex BN16 1PP, UK

No chance to shop around

From Mr Richard S. Henderson.

Sir, I note from your article "Higher carbon tax heats up debate" (Business and the Environment, June 14) that "Angela Merkel, the German environment minister, says the Danish case emphasises a need for 'further harmonisation of the European tax system' to prevent citizens from shopping around the internal market". This may come as something of a surprise to those of your readers who might have supposed that shopping around

was precisely what markets were for.

A brief exposure to German state-regulated shopping hours, which are clearly designed to prevent shopping around, or indeed shopping at all, would rapidly demonstrate that Angela Merkel's attitudes are, however, entirely in line with existing German practice generally. Richard S. Henderson, Heinestrasse 10, D-60322 Frankfurt, Germany

Priority of G7 countries should be to put their economic houses in order

From Mr Rahmi M. Koc.

Sir, The most urgent problem facing the G7 summit is the currency turbulence that is playing havoc with corporate investment and profit margins.

In our annual statement to the summit handed over to the Canadian prime minister in Ottawa last week, the International Chamber of Commerce said the best means open to the seven governments to restore stability in currency markets and promote solid world economic growth is for each to put its own economic house in order. Priority number one is to correct the financial imbalances that are at the root of the present currency instability.

Who should do what? The impression that the US Congress is still bent on cutting taxes rather than expenditure has unproved financial markets. What the US should do is take firm measures to increase its savings rate and tackle its chronic current account deficit. And while Canada has been taking steps in the right direction, there is also still too much red ink in its accounts. Japan is not a passive victim of the rising yen. For too long its economy has been over-gear towards exports. It has only itself to blame for the

slow pace of deregulation which is preventing its economy from adapting to the new world of the 1990s. That needs changing fast.

In the European Union, the principal failure is endemic unemployment, which has been getting worse with every business cycle. The welfare state is fine for those in jobs, but is less attractive when it becomes an impediment to job creation. A bold approach is needed to loosen rigid labour laws and practices, tackle distortions of wage differentials, reduce regulation of business, and bring down non-wage labour costs.

Finally, all the G7 countries must get to grips with the stock of public debt, which in recent years has exploded to average about 72 per cent of collective gross domestic product in the OECD area.

This will require hard domestic decisions. It would be childish to begrudge the G7 leaders their trip to Halifax. But they should remember that sound economic policy, like charity, begins at home. Rahmi M. Koc, president, International Chamber of Commerce, 38 Cours Albert 1er, 75008 Paris, France

Cultural mismatch over names

From Mr Malcolm R. Dale.

Sir, If the English want to be snide about French culture they should get their own right first. Reporting that France "is suffering an invasion of Anglo-Saxon first names", Observer ("Kevin, n'est-ce pas?", June 13) gives three examples - none of which is Anglo-Saxon. Pauline dates

back to the Roman Empire (and was the name of Napoleon's sister), Laura is Italian, with long French associations (remember Petrarch in the Vaucluse) and Kevin is Irish. It should be obvious which culture has been "invaded". Malcolm R. Dale, 405 South Union Street, Alexandria VA 22314, US

Northern Ireland's opportunities not something to be kept secret

From Baroness Dutton of Wakefield.

Sir, Northern Ireland offers one of the most attractive locations for inward investment in the UK. Our successful record in attracting companies during the most difficult times is very visible proof of this.

In the new climate created

by the ceasefires we are seeing increased visits from potential investors and many more phone calls to our overseas offices.

Indeed, I have just returned from Washington where President Clinton and his administration organised a trade and investment conference to help

us build in this new time of opportunity.

The news does not seem to have reached the Financial Times, where every map and table in your relocation supplement of June 9 totally ignored Northern Ireland's existence.

As the best opportunity, we

don't want it to be kept a secret.

Dutton, minister for the economy and agriculture, Department of Economic Development, Northern Ireland, Belfast BT4 2JP, Northern Ireland, UK

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Thursday June 15 1995

The challenges facing the G7

Too much should not be expected from this year's summit of the group of seven leading industrial countries meeting, which begins in earnest today in Halifax, Nova Scotia. Even so, it still has plenty to do.

For several years the summit was dominated, rightly, by the need to complete the Uruguay round of international trade negotiations. Last year, in Naples, the decision was taken to address the reform of other international institutions, including the World Bank and the International Monetary Fund. The Mexican peso crisis has made this choice appear prescient.

To judge by the communiqué leaked to the press late last week, pre-summit negotiations among senior officials have achieved considerable agreement. Strengthening the IMF's surveillance and demands for transparency fall under the head of preventive medicine. Doubling the \$20bn currently available under the General Agreement to Borrow should be regarded as emergency treatment.

The case for improved prevention is overwhelming. When it comes to treatment, however, misdiagnosis carries risks. In principle, the larger pool of emergency funds that is being proposed would be used to assist countries facing liquidity crises, rather than problems of insolvency. For maximum effectiveness, the funds are intended to be granted both more quickly and with more strings attached. These conditions appear contradictory. Either the IMF can move more quickly, or it can be more fastidious in its demands, but it is unlikely, mid-crisis, to manage both.

An even more important worry is whether the line between illiquidity and insolvency can be drawn. Significant liquidity problems usually arise from doubts about solvency. Where insolvency is indeed the problem, a better solution would be via formal debt restructuring, a possibility the G7 seems set to explore.

Degree of caution

Helping developing countries to emerge is as important as stopping the emerging from submerging. The lack of a detailed analysis of the World Bank - and likely absence of agreement on reform of the United Nations - is regrettable.

Mr Clarke's new targets

A malign fate usually catches up with chancellors of the exchequer, unless they move on briskly, as John Major did after he put sterling into the ERM. This is, after all, among the most exposed jobs in British politics. Kenneth Clarke's response to the risks he runs is endearingly robust. Yesterday evening, at the Mansion House, he set out his "no-nonsense approach", based on the - absolutely correct - conviction that the one thing the UK does not need is another "politically motivated dash for growth".

The operational heart of the speech was the commitment to "set interest rates at the level judged necessary to achieve the inflation target of 2½ per cent or less". To rub in the point, the governor of the Bank of England said that it is by this target that "we expect our policy advice to be judged". Mr Clarke added that pursuit of this target should ensure that inflation will remain in the range of 1-4 per cent. Apparently, he means that, in the real world, pursuit of inflation of less than 2½ per cent might, from time to time, lead to inflation higher than that. He is right.

The statement that this target will run beyond this parliament must be taken with the broader commitment to sound public finances and a stable economy. The overall approach is intended to satisfy two different audiences.

Battle for credibility

People engaged in the financial markets search for signs that the chancellor is taking risks with inflation. Both the level of long-term interest rates and the gap between yields on index-linked and conventional gilts show the battle for credibility has still not been won. If the government is serious about achieving its targets, that lack of credibility will impose a cost on the economy, via higher than needed real rates of interest.

Indications of disagreements with the governor of the Bank of England are exhaustively examined. Has he gone soft, as the markets, or are these merely technical disputes? Much will depend on how sound his judgments turn out to be when they diverge from the Bank's. Yesterday, he merely stated that he and Eddie George "have friendly, constructive, occa-

sional, combative discussions about how best to achieve the inflation target to which we are both passionately and equally committed". As if on cue, Mr George agreed that "reasonable people may differ from time to time in the judgments that they make as to precisely what course to steer".

While financial markets wonder if the chancellor is too political, his colleagues in Westminster fear he is insufficiently so. The chancellor is subject to calls from his back benches for more growth and lower taxes, accompanied by usually unspecified cuts in public spending. Many economists continue to wonder - sometimes explicitly, more often implicitly - why the government should bother to keep inflation low. Meanwhile, business people merely insist that the chancellor should provide low interest rates, low tax rates, low inflation and a competitive and stable exchange rate, for good measure.

Clearest neglect

Inevitably, attention will be focused on issues that are currently at the top of the leaders' in-trays: Bosnia, Russia, and the embittered trade relations between the US and Japan. A "hijack" of the summit by Bosnia would be desirable if it produced a new measure of agreement among the interested powers. But it is difficult to believe this is on the cards. The question of Russia's future within the G7 arises here: is it going to be the problem, or part of the solution?

Failure to address the trade issue would represent the clearest neglect of the summiters' immediate task. The defence of the liberal trading system was, arguably, the chief achievement of the first G7 summit, in the early 1970s. It continues to be a high priority for these major market economies.

Some fear that being tough on the US over its current policy towards Japan risks derailing the summit altogether. Yet Mr Clinton has to be told that US unilateralism imperils the rules-based multilateral system, to which his predecessors devoted so much effort and imagination. Who can make this point more effectively than this group of long-standing US allies?

Japan's traumatised financial markets are waiting nervously to see whether history repeats itself. The plunging stock market has reached a critical phase and the expectation is growing that the government will be forced into a rerun of the emergency measures it took in similar circumstances almost three years ago.

The market has now fallen perilously close to levels that in August 1992 sparked a full-blown crisis. In the past year the Nikkei index of 225 leading stocks has fallen 31 per cent. This week it closed below 15,000 for the first time since that critical month.

Investors have been heading for the exits in overwhelming numbers - the big Japanese institutions foremost among them. The life savers, which bought stocks heavily in the 1980s, have subsequently discovered that the falling market has left them almost unable to meet their liabilities. They are dumping their risk-carrying assets; they sold more than ¥2,000bn (\$24bn) in the past month. Individual investors took most of their money out many months ago.

"Domestic sentiment is very depressed," says Mr Haryuoshi Mabuchi, senior strategist at the Nikkei Research Centre, the research arm of Nikkei Securities. "Large institutions will still need to liquidate stocks for some time yet."

Meanwhile, foreign investors, who played a key role in driving the market higher in the first half of last year, have now also turned their backs. For them the rise of the yen has offset much of the loss in the Nikkei in the past 12 months. Between the beginning of January and the first week of May equities fell 14.8 per cent, but in the same period the yen rose 18.5 per cent. However, in the past month, the yen has stabilised while stocks have fallen faster, pushing Japanese investment into negative returns for most foreigners.

In recent weeks the selling pressure has accelerated. Much of it is generally attributed to renewed fears about the health of the banking system. Falling stock prices blow large holes in banks' balance sheets, since they are permitted to count a proportion of their own unrealised gains on equities as capital. The critical level varies for each bank, but if the Nikkei moves below 14,000 a growing number will see their capital levels dip below agreed international guidelines - with bruising implications for the economy. Here lies the strongest parallel with 1992. Then, the market's (and some would say the economy's) nemesis was averted, or at least postponed, by the authorities' action.

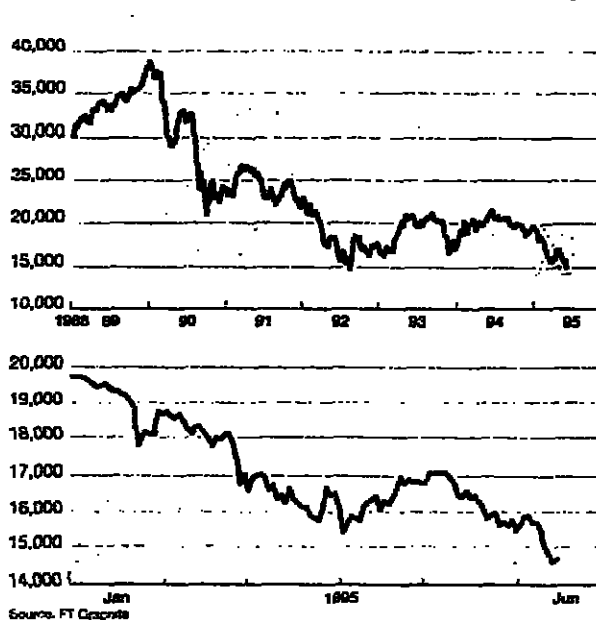
In 1992, as the index threatened to fall below the 14,000 level, the gov-

Poor prognosis for Tokyo patient

Gerard Baker on the grim implications for Japanese banks and the economy of the fall in share prices



Back in the doldrums: the Nikkei 225 Average



ernment moved quickly to shore up the system. It immediately began buying up stocks, through public institutions (the notorious Price Keeping Operation, or PKO) backed up by higher public spending. For good measure it announced some imaginative schemes to help banks with their massive portfolio of non-performing loans and shortly afterwards cut the discount rate to an all-time low. Within days the Nikkei had bounced. And after three months it had risen more than 15 per cent, providing vital flotation for the balance sheets of most of the country's banks.

But it was really only a respite, not a cure. Now prices are back where they were. And this time the condition of the financial system is, if anything, worse. Several smaller banks are believed to be on the point of collapse. Demand for lending is chronically weak and problem loans are still rising. Even in a relatively healthy financial climate the damage would be serious, but in Japan's present state the risk of prolonged debility in the banking system is high.

Yet so far the government has not

ridden decisively to the rescue. The discount rate was cut again in April to 1 per cent and various tax cuts and public spending increases have been tried. But none of them has been targeted at the banks specifically. Last week investors were further demoralised by the unveiling of a long-awaited package of rescue

The market has now fallen perilously close to levels that in August 1992 sparked a full-blown crisis

measures that amounted to little more than a few vague exhortations and the repetition of some basic central banking mantras.

"The leading investors are locked in a deflationary spiral," says Mr Neil Rogers, strategist at UBS Securities in Tokyo. "Falling stock prices depress confidence, encouraging risk-averse investments such as yen bonds. That puts further pressure on stocks and so on. Sooner or later prices fall to a point where

banks have real problems - then the government will have to act."

But the authorities have much less room to manoeuvre this time. One important change from 1992 is popular opposition to the use of public funds to bail out the banking system. In April, the voters of Tokyo elected a governor, a former television comedian at that, whose principal policy platform had been opposition to the city's contribution to a badly bungled bail-out of two small banks. The operation was led by the Bank of Japan and the finance ministry, and many ministry officials saw the vote as a portentous rebuff to their well-laid plans for an orderly reconstruction of the banking system.

The public anger unleashed may have frightened off the authorities from attempting a rescue at all. But even if they do manage to bolt together a bail-out plan for banks that will not incur the wrath of the voters, there is a growing view that investors will still shun the stock market.

According to some analysts, a financial rescue package this time would prove even shorter-lived than

the last one. That is because the market is being driven lower not by alarm about the financial system but by real economic fundamentals. "A bank rescue does not really improve the position much," says Mr David Pike, head of research at BZW Securities in Tokyo. "It doesn't address the main problem - underlying economic weakness."

For the equity market, that weakness has been clearly manifested in dismal corporate profits. Confounding the expectations of most analysts, net profits fell again for the fifth year in succession, in the financial year that ended in March. Only the forecasts for the current year suggest a recovery, with profits expected to rise by more than 30 per cent. But the cruel reality is that forecasts of rising profits have been made in each of the last three years, and have not materialised.

The underlying problem for the corporate sector is the continuing pressure on profit margins from falling prices. Raw materials costs have been falling for more than a year, thanks largely to the strong yen. That is nothing new. Input prices in fact have fallen less this time than they did in the mid-1980s, when the yen's rise pushed them down at an annual rate of 10 per cent at one point.

What is different is that companies are now passing those declines directly on to their customers. Weak demand at home has put pressure on companies to cut their prices. That has been compounded by a surge in imports. "Domestic demand is weak, the yen is strong - that combination is pushing final prices down much faster than inputs," says Mr Peter Tasker, strategist at stockbrokers Kleinwort Benson International in Tokyo.

The overall effect is an unprecedented squeeze on total nominal demand in the economy. For the first time since the 1920s, Japanese nominal gross domestic product in the present quarter is likely to register a decline - not good news for a stock market whose fortunes are tied to nominal, not real performance.

At the root of all this is demand deficiency. Japan is still locked in a chronic malaise of overcapacity from the period of surplus asset prices in the late 1980s. Land prices are still falling, a factor which is transmitted to companies and individuals through smaller wealth and higher real levels of debt.

Until those excesses are eliminated, quick fixes can do little more than give the banking sector some breathing space. They are unlikely to restore confidence to the market, or produce any early sign of strength in what underpins it: the economy.

The death of the conglomerate has been much exaggerated, argues Tony Jackson

Management matters

This week's decision by the US corporation ITT to split itself up seems to sound the death-knell of the conglomerate. For decades, ITT was the classic of the breed: a vast sprawl of unrelated companies, built up through voracious acquisition in the 1960s and 1970s by Mr Harold Gense, its then boss.

Mr Gense's successor, Mr Rand Araskog, has evidently seen the light. As he explained it on Tuesday, ITT's three businesses - insurance, industrial and hotels and gaming - are all capital-intensive. They also need to hire good people.

Splitting the three businesses up, Mr Araskog said, would help them compete in both fields. They could raise capital more cheaply, and could attract staff who would shun the notion of working for a conglomerate. It was a question, he said, of "finding support, both financial and human, to continue the rapid growth of the three parts of the company".

The stock market would appear to agree. In December, before investors began to grasp what ITT had in mind, its stock stood at around \$80 - a message premium to book value in Wall Street terms. By yesterday

it had risen almost 50 per cent to a more respectable \$118.

The old rationale for conglomerates spoke of achieving balance by assembling businesses with different cyclical characteristics. Conglomerates could also take poorly-run companies and subject them to professional management.

The counter-argument is that to compete in today's world, managers need focus. As for the capital markets, they are now sophisticated enough to fund companies through cyclical downturns, while the stock market puts a higher value on businesses which are separately identifiable.

There are several snags in this now familiar argument. Take ITT's case first. The company has been refining itself ever since Mr Araskog took over in 1979, and has shed several hundred subsidiaries - including its original telephone business - in the process. By last year, it had reached the point of separately identifying the three businesses in which it is now splitting itself, and

reported its results accordingly. The hypothesis is thus that back in December the market was seriously undervaluing three clearly identified streams of income, simply because they were represented by one share instead of three. Academics may argue over how efficient the market is in establishing correct

ITT is the classic of the breed: a vast sprawl of unrelated companies, built up by acquisition

value; but inefficiency on this scale seems out of the question.

The argument about focus is awkward on a broader front. It would be hard to find a more focused company than Ford Motor. Its financial record is awful, and its shares stand at a smaller premium to book value than ITT's at their worst.

Corporate America is littered

with high-performing companies which are conglomerates in all but name. Take Johnson & Johnson, which makes anything from toothbrushes and baby oil to blood-testing machines and brain surgery equipment.

Or take General Electric, which makes aero engines and washing machines and owns a television network. Its financial performance and stock rating make it the most valuable company in the US.

There is no doubt that ITT became a machine for destroying value: its book value per share has fallen by almost a fifth in the past five years. This was not because it was a conglomerate, but because its management was not functioning properly. While Mr Araskog might not put it in quite those terms, he touched on the point in talking to analysts on Tuesday.

By way of testing the water for demerger, he said, ITT had spun off its timber and pulp business and a minority stake in its educational services business. "I've had the chance to observe the reaction of

management at both those companies," he said. "While it might be difficult for the head of a conglomerate to admit it, it's clear that there is a distinctly new excitement."

Mr Araskog may be right to think that splitting the company will release the energies of management and improve their performance. That seems to have been the experience of several other companies which have taken the break-up route, such as Imperial Chemical Industries, the UK chemical giant.

That is the basis on which the stock market has pushed up ITT's shares. It will also be why, if Mr Araskog is right, the three new companies will secure capital on better terms.

In short, the argument about conglomerates is a red herring. At certain points, the management of certain companies becomes dysfunctional, and is better disbanded.

Other companies contrive to run highly disparate businesses with great success. Many are, in reality, conglomerates. The fact that they reject the label is in large part the legacy of ITT.

Atomic balls at Halifax

The Halifax G7 summit hasn't even started, yet Jean Chrétien, Canada's prime minister, is already claiming a success.

He has managed to keep the bill for what he calls the "Chevrolet summit" down to \$28m, a reduction of more than \$10m over what Canada paid when it last hosted a G7 summit, in Toronto in 1988.

This penny-pinching has of course been at some cost. One of the unwritten rules of summits is that the organisers ensure free food and drink for the hawks covering the event. Not that they can be bribed, but a full stomach does wonders for coverage. Thus a Reuters report saying journalists would have to pay for grub induced foaming at the mouths of otherwise peaceable scribblers.

Corporate sponsors to the rescue! McCain, a Canadian food group, expects to give away 27,000 packets of fruit juice and 30,000 sticky honey buns in the summit media centre by the time talks finish on Saturday. On the beverage front, Moosehead, a local brewery, will supply beer as well as saving the organisers \$350,000 by lending a security fence to protect the world's leaders.

Among the more enterprising of the 60 companies donating money or services in return for a chance to

plug themselves is a local seafood company, handing out samples of smoked salmon and mackerel to weary travellers waiting by the slow-moving baggage carousel at Halifax airport.

But the prize for unexpected largesse must go to Atomic Energy of Canada, which has braved a summit with a strong environmentalist tinge to hand out something called "atomic golf balls". Treated with electrons, the balls are supposed to have added bounce. Let's hope some of their magic rubs off on the summit leaders.

Slimmer fat cats

Now we know why Salomon Brothers is backing down from its controversial plan to cut the salaries of its top earners by up to two thirds. The fat cats are already suffering enough, judging by a review of Wall Street pay in Financial World magazine.

Indeed, FW had to lower the minimum threshold, from \$10m to \$5m, to find enough people to fill its roll call of the 100 best paid executives on Wall Street. Even so, 60 members of the 1993 class of Wall Street big hitters still failed to make it into the latest list. Of the remainder, George Soros is the best known casualty. For the first time in four years Soros failed to top the list. But he still came in second, with \$70m.

And don't shed too many tears for

Salomon's top team. Five of the top 20 Wall Street earners came from Salomon, compared with one from Leazard Freres - and none from the likes of Morgan Stanley and Goldman Sachs.

Ultimate sacrifice

It's not often that divine intervention tells you to run for the presidency of a country's central bank. But Hanna Gronkiewicz-Waltz, head of Poland's independent central bank, says that it inspired her to do just that, and now she wants to run against the incumbent, Lech Walesa, in the presidential election later this year.

Divine intervention may come in useful to heal some rifts that will crop up along the way. For there will be some blood on the carpet - Walesa promoted her from nowhere into the bank job in the first place.

In her forties and a devout Roman Catholic, Gronkiewicz-Waltz was a relatively unknown academic at Warsaw University, teaching banking law, when she attracted the attention of Walesa in 1992, having preached his merits from the ranks of a tiny political party called Victory.

Not one to shun an acolyte, Walesa promptly put her in charge of the bank, much to the dismay of experts who appointed to her inexperience. She confounded the critics and kept a tight rein over money supply - to the irritation of several government ministers.

What has Walesa done to deserve such disloyalty? Gronkiewicz-Waltz, an anti-feminist, justifies her move by saying Walesa is such an important historical figure that his achievements must not be tarnished by the risk of losing an election.

I didn't mean it

Minoru Makihara, president of Mitsubishi Corporation, is upset. An advertisement by the American Automobile Manufacturers Association, which appeared in the Washington Post on Tuesday, called upon Japan to open its market to foreign cars, trucks and auto parts. The advertisement read: "Who says Japan must ease regulations and change business customs?" Those apparently in favour were named as President Bill Clinton, Senator Bob Dole, Speaker Newt Gingrich - and Minoru Makihara.

Unfortunately for Makihara, head of a company belonging to one of Japan's most prestigious keiretsu, the association had tracked down a quote from him in the Asahi, a leading Japanese daily newspaper, claiming that "Japan must ease business regulations and change business customs".

Mitsubishi says Makihara was misquoted, and that he will fully explain himself to foreign backs in Tokyo today.

Should be an interesting event - so long as the right questions are asked.

Financial Times

100 years ago

Edison Swan Electric Light Co The Civil Lord of the Admiralty was asked in the House of Commons if the Edison Swan Electric Light Company were executing an Admiralty order for incandescent lamps. He was asked if he was aware that a strike began there a fortnight ago, of which the object was to compel the firm to recognise the standard rate of wages; and that one effect of this strike had been to bring out of work 330 women in addition to about 80 men and boys concerned in the strike itself.

New coinage Vienna: The Neue Freie Presse has published a despatch from Budapest stating that the Hungarian Minister of Finance has left for Vienna in order to confer with Dr. Fleiner, the Austrian Finance Minister, regarding the cost of the new coinage to be struck next year.

50 years ago Standard Motor and Australia Mr H.H. Robinson, representative of the Standard Motor Company in Sydney, announced to-day that the Standard Motor Company of Coventry has completed plans to begin manufacturing cars with Richards Industries of Adelaide.

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FINANCIAL TIMES

Thursday June 15 1995

Russian parliament backs foreign investment in oil

By Chrystie Freeland in Moscow and Robert Corzine in London

The Russian parliament yesterday approved a law which could pave the way for tens of billions of dollars of western investment in Russia's oil industry.

Approval of the production-sharing law by the Duma, the lower house of the Russian parliament, was the vital missing piece in Russia's legislative jigsaw regulating foreign investment in the oil sector.

Western companies have held off from going ahead with large oil development projects because of the country's insecure legal environment.

But passage of the legislation means that "now is the moment of truth" for many western oil companies, according to Mr Charles Ackermann, of the Boston Consulting Group.

However, lobbying by Russian oil companies has secured amendments to the bill which

could deprive western oil companies of some of the privileges they would have enjoyed under earlier drafts.

Moreover, some western companies want separate approval for specific projects before committing large amounts of capital. Western businesses in Moscow fear that securing such approvals may prove difficult.

Although both the upper house of parliament and the president may still block the legislation, Russian experts expected it to clear the remaining hurdles easily. The bill could be signed into law by President Boris Yeltsin before the end of this month.

The legislation covers all minerals, including oil and diamonds, and obliges the Russian government to stick to the initial terms of all contracts it signs with foreign investors for the legal duration of the deals.

Political instability in Russia and the country's chaotic civil laws had made western oil companies reluctant to make significant investments without firmer legal guarantees.

Mr Alexei Melnikov, an MP from the reformist Yabloko bloc in parliament and one of the authors of the production-sharing bill, said it would clear the way for 12 substantial oil and gas projects with western investors and for \$60m-\$70m in direct foreign investment over the next decade.

The state property fund yesterday approved guidelines for the sale of convertible bonds by Lukoil, Russia's largest oil company.

Lukoil now has approval to issue convertible bonds backed by an 11 per cent stake in the company currently held by the Russian government. After April 5 1996 the state will relinquish this stake and the bonds will be converted into shares.

Lukoil, which hopes to raise \$300m-\$400m through the bond issue, plans two separate offerings, one for the domestic market and another targeted at foreign investors.

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Mexico planning return to bond market

By Richard Lapper in London

Mexico is about to announce its return to the public bond markets, six months after the peso crisis.

Bancox, a government-owned development bank, is expected today to raise between \$200m and \$300m with Mexico's first public issue since devaluation last December triggered severe financial crisis and a sharp contraction in the economy.

Mr Guillermo Ortiz, finance minister, said legal documentation was now in place for Mexico to raise more money through public bond issues. Mr Ortiz, who was in London for a conference of international borrowers and investors, said the country "had regained access to the capital markets much earlier than I expected".

Banco Santander de Negocios, the Spanish bank, is leading the issue for Bancox. The bond is a floating rate note and is expected to pay interest at 5 per cent above points over the London interbank offered rate (Libor).

Bancox and Nafinsa, another state development bank, have already raised some \$750m in recent weeks.

In contrast to Mexico's recovery from its last financial crisis in the 1980s, the recovery has been based on a rapid growth in exports, made possible in part by a 50 per cent devaluation in the peso.

In the first four months of 1995 exports grew by 32 per cent compared with the same period of last year, with the non-oil and non-fuel assembly of imported components for re-export sectors rising by 40 per cent. During the same period imports fell by 5 per cent on last year.

The export recovery has been so strong that reserves have increased - gross reserves currently stand at \$10.65bn - and Mexico has not made complete use of a multi-billion dollar aid package agreed by the US and the multilateral institutions.

Mexico has also made progress in successfully meeting payments on its short-term government debt, with the value of outstanding tesobonos (dollar-linked treasury bills) falling from some \$30bn in December 1994 to about \$10bn today.

During the first quarter the government repaid \$15bn in tesobonos, drawing \$11bn of this amount from the support package. It expects to repay \$9bn in the second quarter of the year, covering about one third of this amount from its own resources, and a further \$5.7bn during July and August.

Mexico has some \$30bn available to it from the support package available to draw on in the second half of the year.

Mr Bill Martin, chief economist at UBS, argued that the relevant range for monetary policy was now clearly 1-4 per cent and that Mr Clarke had therefore announced "a timely relaxation" which would give him more room for manoeuvre.

In his speech to the Mansion House dinner, Mr Eddie George, governor of the Bank of England, said he very much welcomed Mr Clarke's unambiguous commitment to permanently low inflation.

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THE LEX COLUMN Diet of Worms

Mr Gérard Worms, Suez's chairman, is the Julius Caesar of the French corporate stage. Yesterday, one by one, his most important shareholders publicly plunged their knives into the chairman and his plans. The attack was justified. Mr Worms' desire to raise equity to invest in Finaut was profoundly illogical. The move repeated Suez's traditional trick of buying assets at a premium with lowly rated paper - assets that also offered no synergies with existing businesses. The move might have secured Mr Worms an elegant escape rather than ignominious exit, but, as usual, it involved maximising influence rather than return. Finaut would probably have ended up controlling the group without paying a premium.

Mr Michel Pébereau, BNP's chairman, initiated this crisis by taking a stake in Suez. He must now bring it to a speedy conclusion. Suez's performance has been painfully poor. Without a viable strategy, the status quo is unsustainable. Replacing Mr Worms is not enough.

The arguments for breaking up Suez are compelling. The 30 per cent discount to net asset value could be substantially reduced by selling Indosuez and its valuable Asian franchise. Suez might be tempted to adopt a Franco-French solution by selling it to Crédit Agricole or BNP. But foreign buyers might pay more. Similarly, its stake in Société de Belgique could be sold, or distributed to Suez's shareholders. It is time to put Suez out of its misery: the group long ago ceased to have a valid *raison d'être*.

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FT-SE Eurotrack 200:
1445.8 (-2.4)

UK yield spread

UK minus German 10 year government bonds

2.0

1.5

1.0

0.5

0

Source: Datastream

1994

95

rejected the governor's advice last month to put up interest rates. Given that subsequent economic data have apparently justified the chancellor's decision, he could be less willing to heed the bank's advice in future. The governor's latest spin - that credibility would be damaged if the two men always took the same view - does not cut much ice.

Moreover, despite the chancellor's rhetoric about not having a money tree from which he can pick £10 notes, markets will worry about excessive tax cuts in the next budget. He may be unable to resist the clamour for "give-aways" from backbench Tory MPs. All this means that investors will rightly doubt whether the UK is yet on course to achieve one of the best inflation performances in Europe.

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INTERNATIONAL COMPANIES AND FINANCE

Sparebanken Nor launches rival bid for Norgeskreditt

By Karen Fossli in Oslo

Sparebanken Nor, Norway's biggest savings bank, yesterday launched a rival bid for Norgeskreditt Holding, the emerging Norwegian financial services group.

The move, at the request of Norgeskreditt, comes two days after a lower offer from Christiania Bank, Norway's second biggest bank.

Sparebanken Nor, known internationally as Union Bank of Norway, has offered Nkr220 per preference share, valuing Norgeskreditt - which has assets of Nkr30bn (\$400m) - at more than Nkr2.5bn (\$400m).

On Monday, Christiania bid

Nkr200 per preference share, equivalent to about Nkr2.3bn.

Sparebanken Nor said it made the offer at the request of Norgeskreditt which has rejected Christiania's preliminary approaches on the grounds of price and its plans for the company.

Norgeskreditt, whose main activity is mortgage lending, yesterday sent a letter to shareholders advising that the offer from Sparebanken Nor appeared to be better on "all main points", but said the board would evaluate both bids.

It advised shareholders to wait before deciding on the two offers until June 21 when details of the board's

assessment would be disclosed.

Norgeskreditt closed Nkr21 higher at Nkr221 yesterday, while Christiania fell Nkr0.10 to Nkr213.10.

The contest between Sparebanken Nor and Christiania comes amid a separate takeover battle in the country's financial sector.

The ownership of Vital Forsikring, Norway's biggest life and pension group, is being fought between Aegon, the large Dutch insurance group, and Den norske Bank, Norway's biggest commercial bank.

Aegon last month bid Nkr103 a share for Vital but DnB countered with a higher bid of Nkr110.

KHD parts company with chief

By Michael Lindemann in Bonn

Klöckner-Humboldt-Deutz (KHD), the troubled German engine maker, yesterday parted company with its chief executive, Mr. Werner Kirchgässer, its chief executive. He was replaced by Mr. Anton Schneider, who was until recently a member of the management board at Bremer Vulkan, Germany's biggest shipbuilding group.

Mr. Kirchgässer, 57, became KHD's chief executive in 1991 but is believed to have had disagreements with Mr. Michael Enders, the Deutsche Bank director who chairs KHD's supervisory board, a non-executive group which oversees the company's management.

Mr. Kirchgässer had been with KHD for 26 years and was due to remain chief executive until mid-1996. The company said he would remain as an adviser.

Mr. Schneider, 43, said he would "concentrate especially on improving the company's operating performance through internal measures", according to a statement issued by KHD.

"The priority will be to expand relations with clients, further improve manufacturing processes and cost structures and above all increase the motivation and creativity of the employees," Mr. Schneider added.

Mr. Kirchgässer's departure, by mutual agreement, comes just months after KHD was rescued from bankruptcy with an emergency package worth DM315m (\$550m), over half of which came from Deutsche Bank, the company's biggest shareholder. The company said in May it expected to lose DM308m this year and not break even until 1997.

The difficulties at one of Germany's best-known engine makers stem from the late 1980s, but the company's near collapse in January is believed to have sealed Mr. Kirchgässer's fortunes.

Until this March, Mr. Schneider had been responsible for the engineering and plant divisions at Bremer Vulkan.

Portugal to privatise Tabaqueira

By Peter Wise in Lisbon

The Portuguese government is to privatise Tabaqueira, a tobacco company with annual sales of \$175bn (\$1.2bn), by selling 80 per cent to a single buyer and the remainder to employees and small savers.

The sale is expected in August.

The government said yesterday that 80 per cent of the company, the only cigarette producer in mainland Portugal, would be sold by auction to the highest bidder.

No discrimination would be made between foreign and Portuguese bidders.

The purchaser will be required to retain at least 51 per cent of the company for five years and to buy any shares left over from the subsequent sale of the remainder at a discount to workers, emigrants and small investors.

Three initial appraisals of Tabaqueira, carried out separately by Banco Português de

Investimento, Banco Essi and Banco de Fomento e Exterior, indicated a value of about \$540bn, according to the government. A definitive evaluation has yet to be concluded.

Analysts said Tabaqueira is estimated to account for about 80 per cent of tobacco sales in Portugal. The only other Portuguese cigarette manufacturers produce for the islands of Madeira and the Azores.

Net profit fell 33.6 per cent to \$2.3bn in 1994 from 1993, and sales declined 3.9 per cent to

\$175bn. Cash flow dropped 43.2 per cent to \$3.5bn.

Tobacco is an important source of tax revenue in Portugal.

Mr. Jorge de Mello, a former owner of Tabaqueira before it was nationalised following Portugal's 1974 revolution, is among candidates expected to bid for the company.

Mr. Horácio Roque, a shareholder of the Madeira tobacco company Madeirense de Tabacos, has also declared an interest.

Belgacom posts record earnings

By Emma Tucker in Brussels

Belgacom, Belgium's state-owned telephone group, yesterday announced record profits for 1994, just weeks before the government is expected to announce its choice of foreign partner for the company.

Mr. John Goossens, chief executive, said net profits were BF9.7bn (\$338m) last year, up marginally on 1993's figures, and turnover had risen to BF117bn from BF110.9bn in 1993.

The figures were more important than usual because the Belgian government aims

to sell a 35 per cent stake in Belgacom - which has been valued by the government at BF160bn - before the end of the year.

A shortlist of five leading contenders has been drawn up for what will amount to Europe's biggest, and western Europe's first, telecoms acquisition target.

The interested companies are British Telecommunications, in discussion with Bell Atlantic of the US; Koninklijke PTT Nederland; Ameritech of the US; and Stet, the Italian state telecoms company.

Investments by Belgacom, one of the biggest investors in

Belgium, amounted to BF933bn in 1994, a drop on 1993 when the company acquired the Belgacom Towers building in Brussels.

Last year's investments were concentrated on the digitalisation of the network and other modernisations.

Pre-tax profits fell to BF10bn from BF12.2bn in 1993.

Mr. Goossens said that in spite of mounting competition, he expected a rise in Belgacom's turnover this year but acknowledged the company would face a challenge once the telecoms sector was liberalised across the EU in 1998.

VW issues warning on demand

By Michael Lindemann

Demand for Volkswagen's cars was likely to remain hesitant for the rest of this year and not pick up until 1996, Mr. Ferdinand Piëch, the group's chief executive, warned yesterday.

Mr. Piëch said the new model of the Polo was expected to be the driving force behind higher sales.

His comments were underscored by Mr. Klaus Volkert, head of VW's workers' council, who said that in spite of earlier predictions of stronger

demand, the economic recovery in Europe and North America had not yet translated into higher unit sales.

"The short-lived bush fire has been put out and all that is left is a battle for prices and market share of the sort that we have never seen before in Germany," Mr. Volkert said.

He added that it was "absolutely necessary" to make new investments at the Wolfsburg plant in northern Germany and that "production had to be made more flexible" to raise output.

As part of the effort to

increase production at Wolfsburg, VW's biggest plant, Mr. Piëch said about 5,000 extra workers would produce an extra 600 cars per day during the plant's holidays.

● Volkswagen Bratislava said its 1994 sales reached DM200m (\$142m) and that it expected them to increase to DM700m this year.

The VW offshoot said it planned to begin production of 30,000 cars a year in 1996.

VW is planning 1995 investment in the unit of DM36m. Its 1992 to 1994 investment totalled DM130m.

Petro-Canada sale near

By Robert Gibbens in Montreal

Conditions are improving for the privatisation of the federal government's 70 per cent of Petro-Canada, the country's second biggest integrated oil company. The government hopes to raise about C\$2.2bn (US\$1.6bn).

The government has said no decision would be made until later this month. However, the company is pushing for a quick sale and road shows have been held in Toronto, Boston and New York. Twenty US, Canadian and European investment funds have met the finance department and want to move the issue soon, if only to avoid a clash with the privatisation of Canadian National Railways in the autumn.

Petro-Canada stock has firmed to C\$18, but is still far below the price-earnings ratio enjoyed by Imperial Oil, its bigger rival.

However, Canadian stock markets are now catching up with Wall Street after three weeks of declining short-term interest rates.

InterTech, the US non-wovens group. However, at the eleventh hour BBA appeared.

The board then had to decide whether to agree to BBA's conditions, in particular a "knock-out" contract under which Holvis would immediately sell its non-wovens division to BBA if a higher bid for the whole group materialised.

IP claimed the contract was illegal, but a Swiss court upheld it on the grounds that it was the only way the Holvis board could get a higher offer for its shareholders.

All this is a long way from the traditional Swiss practice in takeover deals. Typically, directors passively agreed to public holders being offered less for their shares than controlling shareholders.

However, most leading Swiss companies have made considerable progress in recognising shareholder interests. Many have reduced restrictions on voting rights and improved disclosure, accepting the

Anglo-Saxon rationale that the best defence against a takeover is a share price that is based on accurate information.

Ironically, Holvis would seem to disprove that rule and may discourage some Swiss companies from further liberalisation moves.

Three years ago, Holvis was the first widely-held Swiss company to eliminate all voting restrictions on its shares and has won awards for the high level of disclosure in its reports. Yet its reward was a depressed share price and to be taken over.

Analysts say it was a special case, with increasing disclosure merely showing that the directors were not sorting out the group's problems.

Many Swiss companies claim they are maintaining voting restrictions as a protection against surprise takeover bids. Switzerland has no law obliging big shareholders to disclose their holdings, except for once a year in the annual report.

Bankers Trust re-rated

By Richard Waters in New York

Bankers Trust, the US bank which has been battered by trading losses and lawsuits over its derivatives operations, was further hit yesterday as its credit rating was cut by Moody's Investors Service.

The US rating agency, in cutting the bank's senior debt rating from A1 to A2, said the action was prompted by concerns about Bankers Trust's reliance on two main businesses, derivatives and trad-

ing. Moody's said the derivatives activities were likely to be hampered by a fall in demand for the sort of complex and high-margin products in which the bank specialised.

It also warned that technological change and consolidation in transaction processing businesses would "challenge" the bank's ability to remain a competitive force in these businesses.

Bankers Trust called the Moody's action "unwarranted" and pointed out that it expected a second-quarter profit.

Ian Rodger

Valeo

ANNUAL GENERAL MEETING OF SHAREHOLDERS
JUNE 12, 1995

Valeo's Annual General Meeting of Shareholders held on June 12, 1995 approved Valeo's accounts for 1994, marked by 13.9% rise in sales to FF 23 billion, and a 38% increase in consolidated net income which totalled FF 990 million.

Equity per share rose from FF 124.5 at the end of 1993 to FF 135.5 at the end of 1994, up by 9%. Net financial debt fell from FF 1.162 billion at end 1993 to FF 124 million at end 1994.

During 1994, the exercise of Valeo B Warrants issued in 1989 and due on April 30, resulted in an increase in capital of FF 362 million. To make Valeo's shares more accessible to American investors, the Group launched a sponsored American Depositary Receipt program (ADR). Valeo also proceeded with a 5-for-1 share split to enhance the liquidity of its shares.

The sales of the parent company rose by 10.5% over 1993 and net income amounted to FF 661 million.

The General Meeting of Shareholders set the dividend at FF 2.30 per share with a par value of FF 30, with a tax credit of FF 1.10 per share, up by 38% as compared with the dividend for the previous year.

Shareholders may choose between payment of this dividend in cash or in Valeo shares.

The issue price, less the dividend amount, for shares in payment of the dividend, calculated on the basis of 90% of the average opening price during the twenty trading days preceding the date of the Shareholders' Meeting, is FF 249 per share.

The year 1994 was marked by particularly intense international activity due both to organic growth with the launching of new plants in the United States, Mexico and South Korea and the setting up of four joint ventures, in which Valeo holds a controlling interest, in China and two in Argentina. The Group also pursued its external growth through the acquisition of the German company Borg Instruments, thereby strengthening its presence in automotive electronics.

In the first quarter of 1995, Valeo's consolidated sales were up by 16% over the same period in 1994 to FF 6.5 billion. At constant exchange rates and on a comparable reporting basis, this increase would have been 18%.

The assumption for 1995 is a 2 to 3% increase in passenger car and commercial vehicles sales in Europe and a slight weakening of the North American market.

Valeo should achieve its sales objective for the first half, with growth attaining double figures. The Group is intensifying its cost reduction program, in particular in the area of production costs. Sharp rises in raw

Rise in sales and income in 1994

Dividend up by 38%

Offer of payment of dividend in shares

materials prices are not being offset by a readjustment of selling prices.

Valeo is also keeping its attention focused on external growth operations. The German Cariel Office has recently given its final approval to the operation in progress with Siemens. Valeo will hold a 79% stake and Siemens 21% in Valeo Climatization which merges the heating and air conditioning businesses of Valeo and Siemens. Furthermore, a new company, Siemens Moteurs Electriques S.A., in which Siemens has a 70% holding and Valeo 30%, will group together their respective electric motors businesses for these systems.

In addition, new activities in Asia, North and South America and in Europe are developing in line with Group forecasts.

Valeo expects to generate sales exceeding FF 25 billion in 1995. As is the case every year, the Group aims to achieve the best possible return of investment for its shareholders.

OPTION OF PAYMENT OF THE DIVIDEND IN SHARES

Shareholders may exercise their option for payment of the dividend in shares between June 19 and July 7, 1995 by informing their financial intermediary. Whatever the option chosen, shareholders will qualify for the tax credit attached to the dividend.

In theory, the maximum number of shares which would have to be created were all shareholders to opt for the payment of their dividends in shares would be 807,090 shares, that is 0.88% of current share capital. The beneficial interest in the new shares will take effect from January 1, 1995 and can either be registered or to the bearer, as the beneficiary wishes. A request for admission to quotation on the Official List (Monthly Settlement Market) of the Paris Bourse under the name "Valeo" will be made for these shares. They will be quoted as from August 10, 1995 after publication of the notice of listing by the "Société des Bourses françaises" (S.B.F.).

The following establishments will make the dividend payment in shares: Banque Indosuez, Banque Nationale de Paris, Crédit Lyonnais, Caisse Nationale de Crédit Agricole, Caisse des Dépôts et Consignations, Banque Paribas, Banque Duménil Leblé, Demachy Worms et Cie., Crédit Industriel et Commercial de Paris, Compagnie Financière de C.I.C. et de l'Union Européenne, Banque Worms, Crédit du Nord, Crédit Commercial de France.

Shareholders who do not opt for the payment of their dividends in shares will be paid their dividends in cash as from July 25, 1995.

The Royal Bank of Scotland Group plc

US \$350,000,000
UNDAATED FLOATING RATE
PRIMARY CAPITAL NOTES

In accordance with the Terms and Conditions of the Notes, notice is hereby given that for the Interest Period from 15th June 1995 to 15th December 1995, the Notes will bear a Rate of Interest of 6.1875% per annum. The amount of interest payable on 15th December 1995 will be US \$314.33 per US \$10,000 Note and US \$7863.28 per US \$250,000 Note.

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CITICORP

U.S. \$250,000,000
Floating Rate Notes due December 1995
Notice is hereby given that the Rate of Interest has been fixed at 6.1875% and that the interest payable on the relevant interest Payment Date September 15, 1995, against Coupon No. 7 will be US\$79.06 in respect of US\$100,000 nominal of the Notes and US\$1,976.50 in respect of US\$1,976,500 nominal of the Notes.

June 15, 1995, London
By: Citicorp, N.A. (Issuer Services), Agent Bank CITIBANK

Heart II Limited

US\$174,000,000
Secured Floating Rate
Notice due 2000
In accordance with the provisions of the Notes, notice is hereby given that for the Interest Period from 14th June, 1995 to 14th September, 1995 the Notes will bear a rate of interest of 6.125% per annum.
The interest amount payable on 14th September, 1995 will be US\$1,806,958.33.
Agent Bank: Dai-ichi Kangyo Bank (Luxembourg) S.A.

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The Financial Times plans to publish a Survey on

Ecuador

on Thursday, July 27 1995

Following two years of austerity measures and market-oriented reform, the government of Sixto Durán Ballón has managed to stabilise the economy, reintegrate Ecuador into the international financial community and set the stage for the country to become Latin America's new emerging market. The survey will report on the country's economy, political scene, financial markets and more.

For more information on advertising opportunities in this survey, please contact:

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FT Surveys

L'ORÉAL

GENERAL MEETINGS

The General Meetings of L'ORÉAL S.A. were held on Tuesday 30 May 1995 and were chaired by Mr. Lindsay OWEN-JONES, Chairman and Chief Executive Officer.

The Annual General Meeting approved the accounts for the 1994 financial year. Consolidated sales increased to FF 476 billion. Net profit before capital gains and losses and after minority interests increased by 20.7% to FF 3,121 million, resulting in earnings per share and investment certificate of FF 50.78, an increase of 14.3%.

The meeting agreed to distribute a net dividend of FF 12.20 per share and investment certificate, payable from Wednesday 28 June 1995 at any French bank or financial institution. The dividend rose by 13% compared to 1993.

The Meeting elected Mrs. BETTENCOURT, née Liliane SCHUELLER, the daughter of L'ORÉAL's founder, and Mr. Édouard de ROYÈRE, former Chairman of L'AIR LIQUIDE, as Directors for a period of four years, which will expire at the time of the Annual General Meeting to approve the Company's accounts for the 1998 financial year.

Finally, the Meeting renewed the authorisation given to L'ORÉAL to purchase its own shares up to a maximum amount of 1% of the share capital.

The authorisation given to the Board of Directors to increase share capital to a maximum of FF 1 billion was renewed by an Extraordinary General Meeting which was held before the Annual General Meeting.

The Board was also given the authority to grant L'ORÉAL stock options to selected employees, up to a limit of 2% of the share capital.

It was decided that the registration of investment certificates should be obligatory.

It was also decided at the Extraordinary General Meeting to raise the maximum number of Directors from 12 to 15.

The 1994 L'ORÉAL Annual Report can be obtained from banks, stockbrokers and financial institutions, or by writing to: L'ORÉAL Business Information and Investor Relations Department - 41, rue Marivaux - 92117 CLICHY - Tel.: +33 1 47 56 70 00 - Fax: +33 1 47 56 80 02.

U.S. \$50,000,000



Crédit Chimique

Floating Rate Notes due 1996

In accordance with the provisions of the Notes, notice is hereby given that for the Interest Period from June 15, 1995 to December 15, 1995 the Notes will carry an Interest Rate of 6% per annum. The interest payable on the relevant interest payment date, December 15, 1995 will be U.S. \$305.00 per U.S. \$10,000 principal amount and U.S. \$7,625.00 per U.S. \$250,000 principal amount.

By: The Chase Manhattan Bank, N.A.
London, Agent Bank

June 15, 1995

CHASE

3i

INTERNATIONAL COMPANIES AND FINANCE

Rautaruukki ahead 70% in first term and is upbeat

By Christopher Brown-Humes in Stockholm

Rautaruukki of Finland, the Nordic region's second-largest steel producer, painted a bright picture of its prospects yesterday after reporting a 70 per cent jump in four-month pre-tax profits to Fm370m (\$58m).

It said strong west European steel markets and higher prices would ensure a "considerable" improvement in its full-year result after last year's Fm440m profit. Turnover would rise to Fm9.4bn from Fm8.3bn.

Last week the group announced a Fm1.5bn investment programme expected to increase steel output to 2.8m tonnes a year from 2.3m tonnes

over five years without damaging the balance sheet.

The figures, which are much better than expected, follow profits of Fm217m in the first four months of 1994.

Rautaruukki said economic recovery had boosted investment and increased steel demand while west European prices were 10 per cent to 15 per cent higher than a year ago. However, the strong market meant average Finnish currency prices were only 6 per cent higher.

Turnover rose to Fm9.2bn from Fm8.5bn in the four months, with higher volumes and firmer prices accounting equally for the 12 per cent increase.

Operating profits surged to Fm508m from Fm288m and the operating margin rose to 17.4 per cent from 11.1 per cent. However, losses rose in the group's engineering division, increasing the uncertainty over the future of its Transnash rolling stock operation.

The group said west European steel demand was expected to remain good and "prices should rise". But it noted there would be a hiccup in its performance in the second four months, because of maintenance work, before profits resumed their upward path.

It estimated its year-end equity-to-assets ratio between 36 per cent and 38 per cent, against 31.6 per cent last year.

Rebels win the day at Suez annual meeting

By Andrew Jack in Paris

The Maison de la Chimie in central Paris was an appropriate location yesterday for an unusually explosive annual meeting of Suez, the flagship French industrial and financial holding company.

The hall that served in late April as the location for the surprise first-round victory celebrations of Mr Lionel Jospin, the French socialist party presidential candidate, was equally appropriate for the outspoken rebellions by leading shareholder groups.

It was Mr Jacques Friedmann, chairman of Caisse des Assurances de Paris, the French insurer which is Suez's largest shareholder at 6.9 per cent, who was the first to rise when Mr Gérard Worms, Suez chairman, opened the meeting to the floor.

Mr Friedmann, who had already given an outspoken interview in the Tribune business newspaper on Tuesday, showed no signs of relenting even in front of such a public - and not entirely friendly - gathering.

He expressed his "disapproval" that the management of Suez had been holding discussions about an investment in Pinault Printemps Redoute, the French retail giant, without raising the matter with the board, on which he sits.

He was swiftly followed by Mr Philippe Jaffré, chairman of Elf Aquitaine, which holds 5.6 per cent of Suez's shares, who said the group was lacking a clear strategy. Mr Jean-Louis Baffa, chairman of Saint Gobain, which controls 5.3 per cent, quickly followed.

Signs that trouble was brewing were evident from the start. The hundreds of shareholders gathered in the main hall, its balcony, an overflow room and the corridors outside, jeered when told the board was still meeting, 20 minutes after the assembly was due to begin.

Mr Worms offered his "infinite pardons" for the delay. But the extra time had clearly not been spent enjoying a lengthy lunch.

The three leading and maverick shareholders called for an amendment to one of the Suez resolutions, without which they would vote against. Mr Worms, quickly endorsed the change in spite of considerable heckling from other shareholders.

The amendment to resolution 10 proposed by Mr Friedmann limited the management's discretion to issue new shares which could be used for a public exchange of shares - something which might be used for an investment or cross-shareholding in Pinault Printemps Redoute.

While Mr Friedmann argues that a link with Pinault is not a logical strategic development for Suez, others see his move as an attempt to push his own alternative plan for a large financial conglomerate involving UAP, Suez and Banque Nationale de Paris, which holds a 5 per cent stake in Suez.

But with a vote of 83 per cent in favour of his amended resolution, he won yesterday's battle.

Humana issues profits warning

By Richard Waters in New York

Humana, one of the biggest managed care groups in the US, warned that its profits would not match market expectations in the second quarter, setting off the second stock-market rout to hit the sector in less than two months.

The Kentucky-based company, which provides services through health maintenance organisations (HMOs) in 14 states, said its earnings growth would be hampered by rising medical costs.

The warning brought an abrupt end to the recovery in HMO stocks that had been under way since mid-April.

The resurgence came after managed care groups were affected by news that United Healthcare, the market leader, planned to reduce its premium rates in a battle for market share.

HMO groups have made substantial inroads into the business of traditional health insurers by providing health care coverage for a lower fixed cost and then signing up chains of hospitals and doctors to provide care more cheaply.

With rapid increases in membership and falling medical costs, profit growth in the sector has been rapid.

Now, though, the bigger HMOs are being forced to fight harder for new members. Also, the costs of providing health-

care services have risen, in part because members signed up in previous years are beginning to make greater use of medical services.

Yesterday, Humana said it expected to earn between 23 cents and 31 cents a share in the three months to the end of June.

Through higher than the 23 cents of a year ago, this prediction is still below the 33 cents a share expected by analysts, the company said. Humana blamed the shortfall on higher medical costs, caused by its members' increased use of medical services.

Like a number of other managed care companies, Humana has come under scrutiny in recent months over allegations

that it has resisted paying the medical bills of some members in an attempt to hold down medical spending.

The company's warning yesterday echoed other recent signs of higher medical costs incurred by the industry. US Healthcare, for instance, pointed to a greater use of medical specialists as a major reason for a slowdown in its earnings growth to 6 per cent in the first three months of this year.

Humana's shares tumbled 14 per cent, to \$19, yesterday morning. Others to be affected by the news included United Healthcare and US Healthcare, both of which were down 6 per cent. See world stock markets

Renault in co-operation deal with German gearbox maker

By Halg Simonian, Motor Industry Correspondent

Renault VI, the trucks and buses division of the French motor group, has signed a letter of intent to co-operate on medium duty gearboxes with ZF, the German gearbox specialist.

Renault will buy models from ZF's nine and 16-speed Ecomid transmission range, while the German company will purchase gears and shafts from Renault VI.

The deal has been struck because demand for such products, which are designed for trucks in the 26 to 35 tonne range, is relatively limited and

manufacturers are keen to seek economies of scale.

Moreover, ZF's gearboxes offer some technical benefits and are lighter than their Renault equivalents, which are better suited to heavier vehicles.

Renault VI gave no indication of the number of units involved, or the value of the deal. However, it said the two manufacturers hoped to reach final decisions on the extent of their co-operation soon.

The agreement comes hard on the heels of a memorandum of understanding this month between Renault VI and MAN of Germany to study the devel-

opment and manufacture of components.

A number of leading truck makers have been trying to establish co-operation deals to reduce development expenditure and split production costs. Renault VI has been particularly active in this respect after merger plans with Volvo of Sweden fell through at the end of 1993.

The company already has an arrangement with Iveco, owned by Italy's Fiat, to work together on truck cabs, and is now undertaking a number of studies to find ways of co-operating more closely with Mack, its US subsidiary, on big truck engines.

IBM and Europay collaborate

By Richard Wolfe

International Business Machines yesterday linked with Europay, the international payment card organisation, to develop a fraud-free shopping service over the Internet.

The joint initiative aims to design a secure payment system based on smart cards, plastic cards which carry a computer chip. Shoppers would be able to use Europay cards to purchase goods and services over the international electronic network using a card reader attached to a personal computer, telephone or television.

Mr Ron Williams, chief executive of Europay, said: "We plan to unleash huge demand for electronic commerce that

capitalises on the revolutionary potential of digital technology.

"There is the potential to attract tens of millions of consumers and process billions of transactions by linking the highest standards of payment security and fraud protection offered by chip cards with Europay brands and IBM's open payment protocol."

The smart card approach is an attempt to solve the problem of smaller payments over the Internet, which are costly to process. Europay's system, which is expected to be piloted early next year, is designed to be used with its "electronic purse" - a card which stores cash value.

However shoppers will also be able to use Europay's debit

and credit cards from 1997 when the traditional cards sporting magnetic stripes are replaced with smart cards.

IBM's alliance with Europay, whose brands include MasterCard in Europe, is one of three separate systems being developed to allow secure card transactions on the Internet. MasterCard is working with Netscape Communications to develop a secure payment system in the US, which is likely to be ready in pilot form this autumn. Meanwhile, Microsoft and Visa International are working on their own system based around Visa's plastic cards.

Security concerns are being eased as software packages are designed to encrypt card details before transmission over the Internet.

Data storage supplier diversifies

By Louise Kehoe in San Francisco

EMC, the leading supplier of data storage systems used with mainframe computers, has entered the "open systems" market and formed marketing alliances with three of the top database software companies.

Building on its success with mainframes - EMC has stolen IBM's market leadership in data storage systems - the company aims to move into systems for use with comput-

ers running the Unix operating system, such as those supplied by Hewlett-Packard, Digital Equipment and Sun Microsystems.

EMC pioneered the use of Redundant Array of Inexpensive Disks (Raid) technology, in which a large number of standard disk drives, much like those used in personal computers, are linked to create a large capacity data storage system.

Raid systems are rapidly displacing traditional data storage

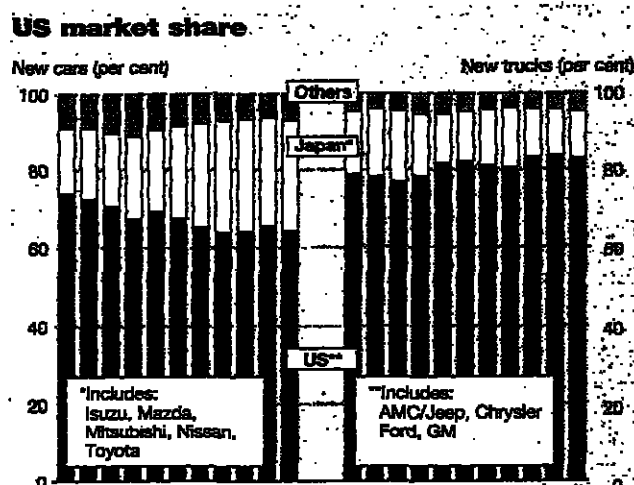
systems from suppliers such as IBM and Hitachi. EMC will this year achieve a 38 per cent share of the world market for data storage systems, measured in gigabytes of storage capacity, according to IDC, the market research group.

IBM will slip behind EMC to 35 per cent, down from a 76 per cent share in 1990, market analysts say. However, IBM and other traditional data storage systems builders have responded with their own versions of Raid systems.

Ford finds a stretch of open road

The rising yen and a return to large vehicles does not mean Japan can be written off, says Richard Waters

US market share



Source: Ward's Automotive Yearbook

result has been a steadily growing disparity in price which has left Japanese vehicles \$2,000 to \$3,000 more expensive on average.

In spite of this, Japanese vehicles made up 28.5 per cent of total sales in the first three months of this year, up from 27.1 per cent in the same period in 1994. Detroit is finding that it takes time to win back the loyalty of customers lost through steadily production and poor styling in the late 1970s and early 1980s.

"Consumers have been slow to realise that there is a price and product advantage in American products," says Mr McCammon. Japanese manufacturers have held on to their market share in part by not attempting to pass on to American consumers the full effects of the recent rapid rise in the yen. According to Ford, Japanese car prices would have to rise a further 20 to 30 per cent to

reflect the most recent two-year depreciation of the dollar. While absorbing the pain, meanwhile, the Japanese makers have already shifted a larger share of their production to the US to put their costs on a more equal footing.

At the start of the decade, only three out of every 10 Japanese cars sold in the US were made in the so-called "transplant" factories there. By last year, that had risen to five out of 10. With no end in sight to the dollar's slide, that figure is set to go much higher.

Even without fierce competition from the Japanese, Ford - like other US manufacturers - has found some parts of the US new vehicle market much tougher this year. Sales of light trucks (mini-vans, pick-up trucks and sport-utility vehicles) may continue to rise - but car sales, which make up about 60 per cent of the total market, have been falling in recent months. Price increases

are looking less likely as a result, while the level of incentives needed to shift vehicles has been rising steadily.

Consumers are "just not buying cars," says one salesman at Bredeford Ford in Glenview, Illinois. Ford's dealerships, Bredeford is finding it particularly tough to shift the Contour/Mystique, the much-awaited "world car" that cost Ford \$6bn to develop: sales have been lacklustre.

With a new model of the Taurus, Ford's biggest-selling car, due to be launched this summer, there was talk early this year of raising prices by as much as 7 per cent. But the weakening car market has made such an increase look more and more unlikely.

Meanwhile, Ford is trying to test the competitive advantage conferred on it by the stronger yen into overseas markets - including Japan itself. The US's second-biggest automaker more than doubled its sales in Japan last year - though at 15,000 vehicles, and with only a handful of dealerships, its presence in the world's second-biggest auto market remains tiny.

"It's important to compete where some of your strong competitors are, and not let them have the market to themselves," says Mr McCammon. Ford 2000, the name given to a recently launched corporate reorganisation, "is all about competing globally," he says.

Ford hopes to reveal its projections for the dollar/yen exchange rate. However, Mr McCammon says: "I think over time the yen will continue to strengthen just as it has done." Japan's "huge trade surplus" will continue to propel the currency, he adds.

With a continuing rise in the yen, could Japanese car makers hope to compete as aggressively again? "It may take them a few years, but we are assuming they will achieve that goal," says Mr McCammon.

Heart drug setback for Cor Therapeutics

By Daniel Green

Cor Therapeutics, one of the US biotechnology companies tipped to make a breakthrough this year, suffered a setback yesterday when it revealed that its heart drug had failed to show statistically significant effectiveness in clinical trials.

Cor shares fell 88 per cent in early trading in New York to \$104.

The drug, Integrilin, was intended for use with patients undergoing coronary angioplasty, in which a balloon is used to widen a partially-blocked blood vessel.

Angioplasty is safer and cheaper than open heart surgery but its beneficial effects are more short-lived, a problem which Integrilin was intended to cure.

California-based Cor held out some hope of further progress with the drug, saying the trial data was complex and the implications of the trial in terms of regulatory approval cannot be readily determined.

Integrilin's failure comes less than a week after the success of another drug from a similar-sized biotechnology company, Cephalon.

Trial results for Cephalon's Myotrophin, which treats Lou Gehrig's disease, a nervous system illness, led to sharp share price rises for the company and the drug's contract manufacturer, Chiron.

Both sets of results came after the "Phase III" trials, usually the last before a drug is submitted to regulatory authorities for approval.

FIDELITY FAR EAST FUND
Société d'Investissement à Capital Variable
Kansallis House - Place de l'Etoile
L-1021 Luxembourg

NOTICE OF ANNUAL GENERAL MEETING

NOTICE is hereby given that the Annual General Meeting of the Shareholders of Fidelity Far East Fund, a société d'investissement à capital variable organisée under the laws of the Grand Duchy of Luxembourg (the "Fund"), will be held at the registered office of the Fund, Kansallis House, Place de l'Etoile, Luxembourg, at 11:00 a.m. on June 27, 1995, specifically, but without limitation, for the following purposes:

1. Presentation of the Report of the Board of Directors.
2. Presentation of the Report of the Auditor.
3. Approval of the balance sheet and income statement for the fiscal year ended February 28, 1995.
4. Discharge of the Board of Directors and the Auditor.
5. Election of six (6) Directors, specifically the re-election of Messrs. Edward C. Johnson 3rd, Barry R. J. Bateman, Charles T. M. Collis, Sir Charles A. Fraser, Jean Hamillius and H.F. van den Hoven, being all of the present Directors.
6. Election of the Auditor, specifically the election of Coopers & Lybrand, Luxembourg.
7. Declaration of a cash dividend in respect of the fiscal year ended February 28, 1995.
8. Consideration of such other business as may properly come before the meeting.

Approval of items 1 through 8 of the agenda will require the affirmative vote of a majority of the shares present or represented at the meeting with a minimum number of shares present or represented in order for a quorum to be present.

Subject to the limitations imposed by the Articles of Incorporation of the Fund with regard to ownership of shares which constitute in the aggregate more than three percent (3%) of the outstanding shares, each share is entitled to one vote. A shareholder may act at any meeting by proxy.

Dated: May 22, 1995
BY ORDER OF THE BOARD OF DIRECTORS

Fidelity Investments

NACIONAL FINANCIERA, S.N.C.
Trust Division
as trustee of the Nafin Finance Trust
(a trust under the laws of Mexico)

US\$200,000,000 Guaranteed Floating Rate Notes due 1997
Unconditionally and Irrevocably Guaranteed by

NACIONAL FINANCIERA, S.N.C.

Notice is hereby given that the Rate of Interest has been fixed at 9.5625% and that the interest payable on the relevant Interest Payment date September 15, 1995 against Coupon No. 11 in respect of US\$10,000 originally issued face amount of the notes will be US\$55.32.

June 15, 1995
By Citibank, N.A. (Issuer Services), Agent Bank **CITIBANK**

U.S. \$500,000,000
CITICORP

Subordinated Bank Adjustable Note Capital Securities BANCS

Notice is hereby given that the Rate of Interest has been fixed at 6.3125% and that the interest payable on the relevant Interest Payment date September 15, 1995 against Coupon No. 35 in respect of US\$50,000 nominal of the Notes will be US\$86.60.

June 15, 1995, London
By Citibank, N.A. (Issuer Services), Agent Bank **CITIBANK**

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our world wide web address is: <http://www.purdywharf.com>

Purdy's Wharf invites you to visit our comprehensive Internet information resource - Doing Business and Living in Halifax. Available during 9:00 a.m. to 5:00 p.m. on the World Wide Web.

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BANQUE PARIBAS
US\$200,000,000
Undated floating rate securities

In accordance with the provisions of the securities, notice is hereby given that for the three month interest period from 15 June 1995 to 15 September 1995 the securities will carry an interest rate of 6.1875% per annum. Interest payable on 15 September 1995 will amount to US\$16.29 per US\$1,000 security.

Agent: Morgan Guaranty Trust Company
JPMorgan

Midland Bank plc
(Incorporated with limited liability in England)

U.S. \$300,000,000
Undated Floating Rate Primary Capital Notes (Series 2)

For the six months from June 16, 1995 to December 15, 1995 the Notes will carry an interest rate of 6.10% per annum. On December 15, 1995 interest at U.S. \$300.00 and U.S. \$3,000.00 will be payable per U.S. \$10,000 and U.S. \$100,000 respectively for Coupon No. 18.

By The Chase Manhattan Bank, N.A. London, Agent Bank **CHASE**

European Investment Bank
ITL 1,000,000,000,000
Floating rate notes due 1998

Notice is hereby given that the notes will bear interest at 10.6375% per annum from 15 June 1995 to 15 September 1995. Interest payable on 15 September 1995 will amount to ITL 135,324 per ITL 1,000,000 note and ITL 1,353,236 per ITL 10,000,000 note.

Agent: Morgan Guaranty Trust Company
JPMorgan

BANQUE PARIBAS
US\$400,000,000
Undated subordinated floating rate securities

In accordance with the provisions of the securities, notice is hereby given that the rate of interest has been fixed at 5.875% for the interest determination period 15 June 1995 to 15 December 1995. Interest payable on 15 December 1995 will amount to US\$2,986.46 per US\$100,000 note.

Agent: Morgan Guaranty Trust Company
JPMorgan

The Kingdom of Belgium
US\$400,000,000
Floating rate notes due December 1999

In accordance with the provisions of the notes, notice is hereby given that the rate of interest has been fixed at 5.875% for the interest determination period 15 June 1995 to 15 December 1995. Interest payable on 15 December 1995 will amount to US\$2,986.46 per US\$100,000 note.

Agent: Morgan Guaranty Trust Company
JPMorgan

European Investment Bank
Portuguese Escudos 30 Billion Floating Rate Bonds due March 2005 (issued on March 15, 1995).

Portuguese Escudos 30 Billion Floating Rate Bonds due March 2005 (issued on June 15, 1995)

Notice to the Holders

Notice is hereby given that the Bonds will carry an interest rate of 9.8815% per annum for the period 15.06.1995 to 15.03.1995.

- PTE 2,491 per PTE 100,000 nominal
- PTE 24,907 per PTE 1,000,000 nominal
- PTE 248,068 per PTE 10,000,000 nominal
- PTE 1,245,340 per PTE 50,000,000 nominal

Luxembourg, June 15, 1995

Lehman Brothers Holdings PLC
(Incorporated in England, formerly named Shearman & Sterling (Lehman Brothers Holdings PLC))

U.S. \$175,000,000
Guaranteed Floating Rate Notes due 1999

Guaranteed as to payment of principal and interest unconditionally and irrevocably by

Lehman Brothers Holdings Inc. (Incorporated in the State of Delaware formerly named Shearman & Sterling (Lehman Brothers Inc.))

In accordance with the Terms and Conditions of the Notes, notice is hereby given that for the Interest Period from June 15, 1995 to September 15, 1995 the Notes will carry an interest rate of 6.8125% per annum. The amount payable on September 15, 1995 will be U.S. \$17,411 for Notes in denominations of U.S. \$1,000.

By The Chase Manhattan Bank, N.A. London, Agent Bank **CHASE**

European Investment Bank
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NEWS DIGEST

Storli's profits undermined by exchange rate

Norway's Storli, one of the world's largest chemical tanker operators, more than doubled four-month operating profits, to Nkr127.4m (\$20.4m) from Nkr60.7m a year ago. It benefited from a 25 per cent rise in time-charter freight rates, writes Karen Fosli in Oslo.

Freight income on a time-charter basis rose to Nkr688.5m from Nkr570.02m last year, but pre-tax profits slipped to Nkr45.74m from Nkr68.07m.

Pre-tax profits were undermined by an average krona-dollar exchange rate in the period of Nkr6.45, some 13 per cent below last year's rate.

Meanwhile, Wilhelm Wilhelmsen, a large Norwegian shipping group, plunged into a four-month pre-tax loss of Nkr3m from a profit of Nkr33.1m. Last year's result included a Nkr180m extraordinary gain from the disposal of the group's shares in a drilling rig.

Operating profits were cut to Nkr72m from Nkr96m as currency losses reached Nkr41m against gains of Nkr71m last year. Financial charges against accounts rose to Nkr34m from Nkr28m.

Wilhelmsen warned that developments in the tanker and currency markets created uncertainty over results for the remainder of the year.

Canadian Distillers wins right to advertise on TV

Canadian Distillers has won the right to advertise on television after a five-year court battle, writes Robert Gibbons in Montreal.

The federal court in Ottawa overturned a section of the Television Broadcasting Regulations prohibiting spirits advertising, saying it violated the distiller's freedom of expression under the Charter of Rights.

Governments and regulatory bodies must recognize that spirits should be treated in the same way as beer and wine, which can be advertised on TV, said Mr Richard Fitzgerald, president of United Distillers and chairman of the Association of Canadian Distillers.

The distillers say they will now concentrate on the issue of unfair taxation. They blame high taxes for the "black market" that accounts for almost half the spirits consumed in eastern Canada.

Imetal plans heavy investment programme

This year should prove a record one for industrial investments, Mr René Mitieus, chairman of Imetal, the French building and industrial materials group, told the annual shareholders' meeting yesterday. Renter reports from Paris.

"Industrial investments should rise sharply, to FF600m-FF750m (\$121.4m-\$151.5m) in 1995 from FF441m in 1994," he said. He added that the main developments would involve construction materials, kaolin, structural tubings and bimetallic products sectors.

He also disclosed that Imetal was reviewing "several external growth opportunities", and that construction materials was a sector

where the group was seeking investment opportunities abroad.

Mr Mitieus disclosed that consolidated turnover in the first five months of 1995 grew 8 per cent compared with the same period in 1994. On a comparable basis, and using constant exchange rates, turnover climbed 11 per cent.

Earnings from the construction materials business were expected to improve further this year as a result of higher sales volume and a recovery in the loss-making tiles and slates units.

Mitieus predicted that the tiles business would break even this year, while slates would start improving by the end of 1995. Slates, however, would still incur a loss of FF12m in 1995, unchanged from the previous year.

Operating profit at the construction materials division rose 27 per cent to FF274m, while turnover grew 13 per cent to FF326m in 1994.

The performance of the industrial materials sector should be "very satisfactory" in 1995, benefiting from higher sales volume and prices. He warned, however, that a weak dollar may hurt US sales denominated in francs.

The sector saw a 13 per cent rise in operating profit, to FF295m, and a 9 per cent increase in turnover to FF1.83bn.

Boral to pay A\$40m for US brick maker

Boral, the Australian building materials and energy group, is buying Isenhour Brick & Tile, a North Carolina brick manufacturer, for around A\$40m (US\$28.8m), writes Nikki Tait.

The US company, described as one of the largest brick companies in the state, has two plants and a total production capacity of about 140m bricks. Annual sales are around US\$23m.

Boral, which currently has no manufacturing operations in North Carolina, will issue approximately 12m shares to the vendors in consideration.

Australian state bank ready for possible float

The Bank of Western Australia - better known now as BankWest - said yesterday it was appointing County NatWest, Hartley Poynton and Porter Western as joint lead managers for its possible stock market flotation, writes Nikki Tait. The last two are Perth-based stockbroking firms.

The Western Australian government has yet to decide on whether to privatise BankWest via a stock market float, or through a trade sale. However, the bank said yesterday the lead managers' appointment meant that float preparation could move "to an advanced stage, so that the government can make an informed choice about the merit of a float relative to a sale by tender".

The potential proceeds from the BankWest sale have been estimated at around A\$750m-plus.

Cement group upbeat

Associated Cement Companies, India's largest cement maker, said production in the first two months of fiscal 1995-96 was up 20 per cent on the year-ago period, Renter reports from Bombay. At yesterday's annual meeting, the company reported a net profit of Rs1.44bn (\$45.9m) for fiscal 1994-95.

Mitsubishi Bank unveils loan fall

By Emiko Terazono in Tokyo

Mitsubishi Bank yesterday revealed that its restructured loans, or loans whose interest rates have been cut due to the borrowers' financial problems, declined during the year to March.

Mitsubishi is the only Japanese bank to release annual earnings figures under US disclosure rules, because of its listing on the New York Stock Exchange. It said yesterday its consolidated restructured loans, a figure which all Japanese banks will be required to start reporting next year, fell 7.3 per cent from the previous year, to Y495.4bn (\$5.9bn). The bank also said its group non-

performing loans at the end of March rose 2 per cent to Y627.3bn.

Mitsubishi, which in March announced plans to merge with Bank of Tokyo to create the world's biggest bank, announced its parent earnings results based on Japanese accounting rules last month. These indicated that bad-loan figures had declined 5.2 per cent to Y536.4bn.

While the level of Mitsubishi's problem and restructured loans are regarded as relatively small compared with the country's other leading commercial banks, its earnings figures under US accounting guidelines are seen as a better indication of the health of the

Japanese banking industry, as Japanese disclosure rules are less strict.

The report under US rules showed that the bank's domestic non-performing loans rose 7.7 per cent to Y564.9bn, while overseas bad loans fell 31 per cent to Y82.4bn. Restructured loans to domestic companies fell 6.9 per cent to Y487.4bn, while overseas restructured loans fell 24.8 per cent to Y7.9bn.

Group pre-tax profits for the year to March fell 25 per cent to Y55bn, on a 4.5 per cent decline in operating revenue to Y2,190.2bn. Net profits fell 7.7 per cent to Y35.5bn. Net unrealised gains on investment securities totaled Y351.3bn, compared with the Y818.9bn posted by the parent.

For the full year to next March, the bank expects consolidated pre-tax profits to fall 28.7 per cent to Y45bn, on a 0.7 per cent rise in operating revenue to Y2,572.1bn.

The Bank of Japan, meanwhile, yesterday released its survey of restructured loans for the overall industry. At the end of March, restructured loans of 150 banks totaled Y7,818.7bn, up 12.5 per cent from a year before. The release follows recent estimates by the Ministry of Finance that restructured loans extended by the country's leading 21 banks totaled more than Y10,000bn at the end of March.

Normandy and French group agree fresh deal

By Nikki Tait in Sydney

Normandy, the Australian mining company headed by Mr Robert Champion de Crespigny, said yesterday it had modified its complex A\$450m (US\$323.7m) deal with France's state-owned Bureau de Recherches Géologiques et Minières. The new deal allows BRGM to retain a 51 per cent interest in the Yanacocha and Cedim projects in Peru.

These have been the subject of litigation, with BRGM's Peruvian joint venture partners - among them Newmont Mining Corporation in the US and Compañía de Minas Buenaventura - claiming that the Normandy deal meant that pre-emptive rights conditions were being triggered.

Under the restructured deal, Normandy said BRGM would retain a 51 per cent interest in the Peruvian assets. As previously proposed, the balance of the assets involved in the deal would go into a new company - LaSource Company Miniere - which would be 60 per cent owned by Normandy and 40 per cent by BRGM.

The deal will now be completed in two stages: Normandy will first take a 49 per cent interest in LaSource (LaSource's direct interest in the Peruvian assets will then be reduced to 49 per cent; and then Normandy will lift its interest to 60 per cent.

"Both the BRGM group and the Normandy group are very confident, based on the advice of their respective Peruvian lawyers, that once the courts have had the benefit of a full explanation of the LaSource transaction, they will decide that no breach of the pre-emptive rights provisions has occurred, or will occur," said the Australian company in a report to shareholders. Normandy recently changed its name from Normandy Possidon.

● Ningini Mining (NML) said yesterday it had completed the purchase of an additional 16 per cent interest in the Lihir gold project in Papua New Guinea from RTZ's Kennecott Explorations.

The consideration, negotiated two years ago, was US\$48m. In addition, NML paid US\$6.1m as back payment of capital costs associated with the expanded interest.

IDBI undaunted by market frailty

India's stock markets might have been in better health to welcome the country's record public share issue, the Rs21.8bn (\$894.4m) offer from the Industrial Development Bank of India. The market is more than a third off its peak of September last year, gasping for liquidity, overhung by a glut of new primary issues, beset by a wave of institutional selling and apparently bereft of all but ritual buying support.

None of this, however, has deterred IDBI, the country's leading financier of industrial projects, from proceeding with the offer, which opens for seven days on July 5. "Is the timing right? Well, we need the funds," says Mr S. H. Khan, IDBI's chairman and managing director. "I'm not sure how long these market conditions will last but from all indications the market is not going to improve quickly."

IDBI needs the funds because the government's economic reforms of 1991 have gradually eroded the concessionary state support which it has enjoyed since its foundation in 1964. State-owned institutions must now, wherever possible, stand on their own financial feet. And, for the past three years, the bank has largely managed, meeting 90 per cent of last year's funding requirements from internal accruals and the remainder from local and foreign borrowing.

But, with an eye on playing a central role in financing India's giant infrastructural needs, notably in the power sector, Mr Khan said the bank had no choice but to tap the equity markets.

The government itself paved the way last October by permitting the institution to float up to 49 per cent of its stock. The government will also put its own coffers by selling an additional 2 per cent of IDBI stock on its own account, concurrent with the IDBI issue, taking its post-sale holding to 72.7 per cent.

The financier is ready to launch its record issue, writes Mark Nicholson

institution is already quietly eyeing a possible call on the international bond market of perhaps \$450m by early next year.

Mr Khan said this week he expected IDBI to provide fully a third of the total of domestic institutional lending to India's power sector over the next five years, a figure he put at Rs130bn.

IDBI's gross investment approvals to Indian industry by the end of March 1995 exceeded Rs900bn, with disbursements reaching Rs500bn. IDBI's total assets of Rs345.8bn make it one of the world's 10 biggest development banks and dwarf those of any other Indian institution.

However, IDBI is not strictly comparable with any other national financial institution. None other stretches as widely in the range and size of industries which it supports, or in the mix of assistance it can provide.

In 1994, it sanctioned project finance assistance worth Rs67bn, comprising rupee loans of Rs32bn, foreign currency loans of Rs10bn, under-

writing worth Rs7bn, direct subscription of Rs4bn and deferred payment guarantees of Rs14bn. Sectors to benefit included chemicals, textiles, power, road transport, iron and steel, and services. Direct industrial lending last year made up 83 per cent of IDBI's total investment approvals.

The bank's second core activity, which also follows from its

institutional role, is in indirect assistance to state industrial institutions, predominantly in refinancing for State Financial Corporations and Small Industries Development Corporations in each Indian state - for which IDBI sanctioned gross lending of Rs5.7bn last year.

While IDBI will continue to lead Indian institutions in such roles, Mr Khan says the bank is acutely aware of its need to meet the opportunities presented by India's deregulation. It must also respond to corporate India's diminishing reliance on direct credit, as the fashion grows for securities market financing.

IDBI is seeking to diversify and deepen fee-based businesses, which presently contribute only a small portion of overall earnings. It has already set up its first mutual fund, and has taken a broking seat on the national stock exchange.

A merchant banking division is now three years old, and last year managed 77 rights and public issues raising a total of

Coca-Cola arm seeks A\$670m

By Nikki Tait

Shares in Coca-Cola Amatil, the Sydney-based soft drinks group which is controlled by Coca-Cola in the US but listed separately on the Australian stock exchange, rose 12 cents to A\$7.37 yesterday, after the announcement of a A\$670m (US\$482m) one-for-four rights issue designed to fund expansion. The issue, announced on Tuesday, is pitched at A\$7.00 a share.

The cash call was rumoured a week ago, and prompted a sharp fall in CCA shares which had previously stood above A\$8.20. In the event, the cash call is lower than the market expectation of A\$7.50m.

The funds will be used in part to buy - for US\$131.4m - the bottling operations in Romania which are held by the parent Coca-Cola company's wholly-owned subsidiary, The Coca-Cola Export Corporation. CCA has also agreed to buy-out the 51 per cent it does not already own of an Indonesian unit.

Citic HK sells part of stake in colony's telecoms group

By Louise Lucas in Hong Kong

The Chinese government's main domestic and international investment agency yesterday sold 61m shares in Hongkong Telecom, raising some HK\$945.5m (US\$122.3m). The funds will be channelled into oil exploration and other infrastructure projects on the mainland.

The sale, believed to involve a single buyer, represented a 0.5 per cent stake in the Hong Kong utility. It was made through Citic Hong Kong, a wholly-owned subsidiary of China International Trust and Investment Corporation of Beijing.

Citic Pacific, the Hong Kong-listed arm which is 43 per cent owned by Citic HK, retains its 12 per cent holding in Hongkong Telecom.

Hongkong Telecom is the colony's monopoly telecoms provider. Cable & Wireless of the UK has a majority stake.

Mr Henry Fan, managing director of Citic Pacific, said Citic HK felt the time was right to cash in its shares, which were sold at an average price of HK\$15.50 each.

"It's not that we don't have confidence in the future of Telecom - we do, and that's why Citic Pacific still holds 12 per cent - but because we are in the process of going into new projects in China and think it's a good time to be cashing in what is, anyway, a tiny holding and utilising the funds for our infrastructure development," he said.

He said the move was in line with Citic HK's role as a "nursery", nurturing projects that need longer lead times or carry more risk prior to injecting them into Citic Pacific. The Citic Pacific shares owned by the group, and its Dragonair holding started life in Citic HK, as did the entire stake in Hongkong Telecom.

In January 1993, when Citic Hong Kong sold 12 per cent of

Hongkong Telecom to Citic Pacific, the stock was sold at HK\$7.80 a share, where it stood to make a profit of HK\$4.2m.

Calculations on the profit cleared by Citic HK this time are confused by the issue of a covered warrant, which formed part of the group's original financing of the Hongkong Telecom stake in 1990.

Part of the tranche of shares was bought at HK\$4.47, and the balance was the result of exercising a cash option on the covered warrants.

Shares accumulated as a result of handing out cash instead of shares come at a higher price.

Analysts echoed Mr Fan, saying the sale was in line with Citic Hong Kong policy and did not reflect badly on Hongkong Telecom, which loses its monopoly on domestic fixed-line services at the end of this month.

Hongkong Telecom's shares yesterday rose 45 cents to HK\$15.55.

This announcement appears as a matter of record only.

1995

Kingdom of Sweden

(Represented by the Swedish National Debt Office)

U.S.\$6,000,000,000

Multicurrency Revolving Credit Facility

Citibank International plc

Arrangers:

J.P. Morgan Securities Ltd.

Underwriting Lead Managers:

ABN AMRO Bank N.V., Stockholm Branch

The Bank of Tokyo, Ltd.

Banque Nationale de Paris

Banque Paribas

Barclays Bank PLC

Bayerische Landesbank Girozentrale

BBL Ireland

Citibank, N.A.

Commerzbank Aktiengesellschaft

Credit Suisse

The Dai-ichi Kangyo Bank, Limited

Dresdner Bank Luxembourg S.A.

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The Fuji Bank, Limited

The Industrial Bank of Japan, Limited

Morgan Guaranty Trust Company of New York

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The Mitsubishi Bank, Limited

NatWest Markets

Nordbanken

The Sakura Bank, Limited

Société Générale

The Sumitomo Bank, Limited

Svenska Handelsbanken

Sparbanken, Swedbank Markets

Swiss Bank Corporation

WestLB Group

Lead Managers:

The Asahi Bank, Ltd.

Bayerische Vereinsbank Aktiengesellschaft

Den Danske Bank

The Long-Term Credit Bank of Japan, Limited

The Norinchukin Bank

The Sanwa Bank, Limited

Managers:

The Daiwa Bank, Limited

DePfa-Bank Europe plc

Landesbank Schleswig-Holstein International S.A.

Royal Bank of Canada Group

Südwestdeutsche Landesbank Girozentrale, London Branch

The Tokai Bank, Limited

Co-Managers:

Banque et Caisse d'Epargne de l'Etat, Luxembourg

DSL Bank Luxembourg S.A.

The First National Bank of Chicago

Istituto Bancario San Paolo di Torino S.p.A.

Landesbank Rheinland-Pfalz International S.A.

London Branch

Westpac Banking Corporation

Unibank

Agent:

Citibank International plc

CALL FOR EXPRESSION OF INTEREST IN PURCHASING A GROUP OF ASSETS OF "INSTITUTIONAL A.E.B.E." OF ATHENS GREECE

ETHNIKI KEPHALEOU S.A., Administration of Assets and Liabilities of 1 Skoufion Str. Athens, Greece, in its capacity as Liquidator of "INSTITUTIONAL A.E.B.E.", a company with its registered office in Athens, Greece, (the "Company"), presently under special liquidation according to the provisions of Article 464 of Law 1892/1990, by virtue of Decision No. 5069/94 of the Athens Court of Appeal invites interested parties to submit within twenty (20) days from the publication of this call, non-binding written expressions of interest for the purchase of the group of assets mentioned below.

BRIEF INFORMATION

The Company was established in 1993. In 1978 it became bankrupt and on 3.11.94 it was placed under special liquidation according to the provisions of Article 464 of Law 1892/1990. Its objectives included the production of pipes and metal constructions.

ASSETS OFFERED FOR SALE

A factory standing on a plot of 3,488 sqm, located in Moschato Municipality, between Ladef, Mandri and Cyprus Streets. The factory is leased to third parties.

SALE PROCEDURE

The Company's assets will be sold by way of Public Auction in accordance with the provisions of Article 464 of Law 1892/1990, (as supplemented by art. 14 of L.2000/1991 and subsequently amended) and the terms set out in the call for tenders for the sale of the above assets, to be published in the Greek and foreign press on the dates provided by law. (This is the third section to take place).

SUBMISSION OF EXPRESSIONS OF INTEREST - OFFERING MEMORANDUM - INFORMATION

For the submission of Expressions of Interest and for obtaining copy of the Offering Memorandum, please contact the Liquidator, "ETHNIKI KEPHALEOU S.A. Administration of Assets and Liabilities", 1, Skoufion Str. Athens 105 61, GREECE. Tel. +30-1523.1484 - 87 fax: +30-1-921.97.05 (Attention Mrs. Manika Pranghli).

The Financial Times plans to publish a Survey of North American Business Locations

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- The FT reaches more senior European decision-makers responsible for business locations/site selection than any other English-language newspaper. (Source: ENR 12/9/93)
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For a full editorial synopsis and details of available advertisement positions, please contact:

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COMMODITIES AND AGRICULTURE

US to suspend set-aside as cereal output sags

By Laurie Morse in Chicago

This season's US wheat harvest will be so small that producers will be allowed to plant freely again this fall, without set-aside constraints, the US secretary of agriculture told a congressional committee on Tuesday.

Mr Daniel Glickman, said in testimony to the Senate agriculture committee that his "guidance" to wheat farmers was that there would be no set-aside requirements for farmers participating in federal farm programmes next year. The US Department of Agriculture usually announces its wheat set-aside requirements on June 30. However, because Congress is rewriting farm programme legislation this summer, the official set-aside announcement must wait until a new Farm Bill is signed.

With estimates of this year's wheat harvest diminishing, few had expected the USDA to ask farmers to reduce plantings next year. In a report on Monday, the USDA reduced its estimate for this year's wheat crop to 2.26bn bushels (60lb each), down from 2.32bn a month ago and about 6 per cent below last year's harvest. The new estimate puts US wheat stocks at a mere 439m bushels at the end of the crop year, the smallest carryover supply since 1974.

Mr Ed Allen, a USDA wheat specialist, said heavy rains in Oklahoma and too much moisture in other winter wheat growing areas had caused crop deterioration. In the US spring wheat belt, rain had delayed plantings. In the spring wheat areas, we've had to reduce our estimates for planted acres," Mr Allen said.

The USDA this week also sharply reduced its projection for this year's maize harvest, dropping its production estimate to 7.9bn bushels (56lb each), down 8 per cent from last month and more than 20 per cent below last year's bumper harvest. The new figures would leave the US holding just 748m bushels of maize in reserve immediately before next year's harvest. That amounts to about a month of consumption, based on the USDA's usage estimates.

The shortened harvest forecasts boosted maize and wheat futures prices at the Chicago Board of Trade on Tuesday, though prices remained below highs scored earlier this season. In late trading yesterday when futures for July delivery were up 8 cents at \$3.87 a bushel, while July maize was up 2½ cents at \$2.74.

Price rise brings Cornish tin close to break-even

The recent strength of tin prices, with the market rising to the highest levels for nearly three years this week, means that the UK's sole tin mine, at South Crofty in Cornwall, is nearing break-even, reports Reuters.

"As far as we are concerned [the market's strength] is all to the good," Mr Kevin Ross, South Crofty's managing director, said yesterday. "But I am not predicting that we will be in profit. There is significant market volatility."

On Tuesday the London Metal Exchange three months delivery tin price hit a high of \$6,670 a tonne in response to concerns about a "squeeze" on immediately available supplies. By last night's close it had eased back to \$6,585.

Mr Ross said that the mine in Cornwall, in which Canada's

South Crofty Holdings, has a majority stake, would break even at around \$4,000 a tonne, just below yesterday's LME close.

He said that the fundamental outlook for the market had improved considerably since the last quarter of 1994, as the level of stocks had fallen markedly.

"My view is that it has been in deficit over the last eight

months," he added.

The west's supply/demand deficit had previously been met by increased shipments from China, which exported double its Association of Tin Producing Countries quota in 1994. But that has changed this year as the country is showing signs of adhering to a 20,000-tonne export limit, Mr Ross said.

In addition, disposals from

the US Defence Logistics Agency's strategic stockpile are running at only 6,000-7,000 tonnes a year, half the maximum 12,000 tonnes allowed, as consumers are reluctant to take its ageing tin. This has resulted in significant off-take from the LME stockpile, which is now down from last September's 7½-year high of 32,405 tonnes to 16,615 tonnes, the lowest levels since February 1993.

Setback for shrimpers in battle of the mangroves

Ecuador has protected a vast area, much to the chagrin of the industry, writes Raymond Collitt

The Ecuadorian shrimp farming industry, the country's second largest, is enmeshed in an environmental controversy that could severely limit future growth in the sector. Environmentalists are accusing the industry of recklessly destroying the mangrove around the country's Pacific coast.

The minister of Industry and Commerce, Vicente Maldonado, said: "The group's demand is ridiculous and unpatriotic."

Figures from the state-run geographic institute refute claims by environmentalists that 70 per cent of the coun-

Differences over how much mangrove has been destroyed is only one indication of how political the controversy is. The government is reluctant to do anything that might hinder the growth of the shrimp industry, which is the coun-

forces of the ocean.

In March of this year the government declared a vast area of mangrove in the northern province of Esmeraldas as a protected area. As a result, several multi-million dollar shrimp farming projects had to be put on hold. Yet far from putting an end to the controversy, it simply stoked the fire.

The island of Pampalán, within the protected area, has become a principal battleground in the war between conservation and development. Poverty among the native fishermen is oppressive; malaria widespread; health services non-existent; and there is no electricity. Shrimp farms promise hundreds of jobs.

Shrimp farmers, who have themselves suffered losses through water pollution, which they claim stems from pesticides used on banana plantations, admit to some destruction of mangroves. But they say that claims by environmentalists are exaggerated and that control mechanisms are being implemented.

The conflict intensified after a call for an international boycott of Ecuadorian shrimp, by the environmental group Accion Ecológica. Says Gina Chavez, co-founder of the group: "The way shrimp farms are run today, they are not environmentally sustainable."

Shrimp farmers have already destroyed. The official statistics indicate that some 41,000 hectares of mangrove have gone in the last decade, 20 per cent of the total. An aerial survey of the coast shows mixed results.

Many of the mangrove in the Gulf of Guayaquil, where the majority of the shrimp farms are located, appears still to be intact. Smaller mangrove forests in other estuaries further north, such as in Bahía and Muisne, are largely destroyed.

Shrimp's second most important non-petroleum source of income, but at the same time it is facing strident attacks from environmental groups, often backed by foreign aid organisations, who are frustrated with its inaction on a problem that began over half a decade ago.

Yet Juan Xavier Cordovez, the president of the Chamber of Aquaculture, says that such claims are completely unfounded. Referring to the call for a boycott he said: "Such behaviour is irresponsible and could cause a detrimental effect not only to the shrimp industry but to the entire Ecuadorian economy."

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MARKET REPORT

Profit-taking in New York reverses coffee price decline

Profit-taking in New York reversed the downturn in COFFEE prices yesterday but traders said the short-term direction of the market was still downwards.

The September robustas contracted at the London Commodity Exchange dipped to \$3.55 a tonne at one stage before rallying to close at \$2.71, down just \$3 on the day.

Traders said New York operators had been expected to buy back some of the 7 cent losses seen late on Tuesday in anticipation of a bullish US Department of Agriculture estimate of the coming Brazilian crop. In fact the estimate proved neutral.

The USDA forecast Brazil's 1995-96 crop at 17.5m bags (80kg each), compared with the mid-point in its previous forecast of 17.45m. It put world

green bean output at 87.4m bags, down from 93.8m bags last year largely as a result of the 1994 frosts and drought in Brazil. Colombian production was seen at 12.5m bags.

LCE COCOA futures prices were also buoyed in the afternoon by a firmer than expected tone in New York and regained most of their early losses.

Traders said they expected cocoa prices to fall gently in coming days as speculators extended short positions. But that could lead to sudden volatility if stop-loss orders were deliberately triggered by strong operators so that they could buy back on the consequent fall.

London white SUGAR prices were mixed in afternoon trade with the August contract faltering and reversing earlier gains.

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London white SUGAR prices were mixed in afternoon trade with the August contract faltering and reversing earlier gains.

Compiled from Reuters

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Compiled from Reuters

Compiled from Reuters

COMMODITIES PRICES

BASE METALS

LONDON METAL EXCHANGE

(Prices from Anonymous Metal Trading)

ALUMINIUM, 99.7 PURITY (\$ per tonne)

Close 1740-1 1761-2

Previous 1730-1 1750-4

High/Low 1735-5/1735-5

AM Official 1735-5

Kerb close 1765-6

Open int. 186,898

Total daily turnover 36,797

ALUMINIUM ALLOY (\$ per tonne)

Close 1800-20 1825-40

Previous 1800-20 1825-40

High/Low 1800-20 1825-40

AM Official 1800-20

Kerb close 1825-30

Open int. 2,450

Total daily turnover 369

LEAD (\$ per tonne)

Close 613-4 626-7

Previous 617-8 630-1

High/Low 613-4 626-7

AM Official 613-4

Kerb close 626-7

Open int. 31,174

Total daily turnover 6,575

NICKEL (\$ per tonne)

Close 7290-9000 7725-30

Previous 7290-9000 7725-30

High/Low 7290-9000 7725-30

AM Official 7290-9000

Kerb close 7725-30

Open int. 43,966

Total daily turnover 13,182

TIN (\$ per tonne)

Close 6730-40 6890-90

Previous 6740-50 6900-10

High/Low 6740-50 6900-10

AM Official 6740-50

Kerb close 6900-10

Open int. 19,712

Total daily turnover 5,845

ZINC, special high grade (\$ per tonne)

Close 1001-5-3.5 1029-7

Previous 1003-4 1029-7

High/Low 1003-4 1029-7

AM Official 1003-4

Kerb close 1029-7

Open int. 95,098

Total daily turnover 18,248

COOPER, grade A (\$ per tonne)

Close 2950-5 2980-7

Previous 2950-5 2980-7

High/Low 2950-5 2980-7

AM Official 2950-5

Kerb close 2980-7

Open int. 240,615

Total daily turnover 38,367

LME AM Official 2/8 ratio 1.9999

LME Closing 2/8 ratio 1.9999

Spot 1.6078 3 mth 1.6059 6 mth 1.6031 9 mth 1.6003

HIGH GRADE COPPER (COMEX)

Close 357.20-30 367.00-00

Previous 357.20-30 367.00-00

High/Low 357.20-30 367.00-00

AM Official 357.20-30

Kerb close 367.00-00

Open int. 1,200

Total daily turnover 1,200

PRECIOUS METALS continued

GOLD COMEX (100 Troy oz; \$/troy oz)

Close 388.3 +1.2 389.3 388.3 629 338

Previous 388.3 +1.2 389.3 388.3 629 338

High/Low 388.3 +1.2 389.3 388.3 629 338

AM Official 388.3 +1.2

Kerb close 389.3 +1.2

Open int. 403.5 +1.2

Total 164,984 22,802

PLATINUM NYMEX (50 Troy oz; \$/troy oz)

Close 437.6 +1.7 438.6 438.6 10,334 3,989

Previous 437.6 +1.7 438.6 438.6 10,334 3,989

High/Low 437.6 +1.7 438.6 438.6 10,334 3,989

AM Official 437.6 +1.7

Kerb close 438.6 +1.7

Open int. 445.8 +1.8

Total 21,889 4,119

PALLADIUM NYMEX (100 Troy oz; \$/troy oz)

Close 159.70 -0.30 - 150

Previous 159.70 -0.30 - 150

High/Low 159.70 -0.30 - 150

AM Official 159.70 -0.30

Kerb close 150

Open int. 185.25 -0.30

Total 8,447 434

SILVER COMEX (100 Troy oz; \$/troy oz)

Close 330.7 -0.8 330.7 330.7 14,744 10,338

Previous 330.7 -0.8 330.7 330.7 14,744 10,338

High/Low 330.7 -0.8 330.7 330.7 14,744 10,338

AM Official 330.7 -0.8

Kerb close 330.7 -0.8

Open int. 330.7 -0.8

Total 108,288 26,398

CRUDE OIL NYMEX (42,000 US gal; \$/barrel)

Close 18.67 -0.04 18.63 18.63 50,051 22,999

Previous 18.67 -0.04 18.63 18.63 50,051 22,999

High/Low 18.67 -0.04 18.63 18.63 50,051 22,999

AM Official 18.67 -0.04

Kerb close 18.63 -0.04

Open int. 18.63 -0.04

Total 18,232 18,232

CRUDE OIL IPE (\$/barrel)

Close 18.67 -0.04 18.63 18.63 50,051 22,999

Previous 18.67 -0.04 18.63 18.63 50,051 22,999

High/Low 18.67 -0.04 18.63 18.63 50,051 22,999

AM Official 18.67 -0.04

Kerb close 18.63 -0.04

Open int. 18.63 -0.04

Total 18,232 18,232

HEATING OIL NYMEX (42,000 US gal; \$/barrel)

Close 18.67 -0.04 18.63 18.63 50,051 22,999

Previous 18.67 -0.04 18.63 18.63 50,051 22,999

High/Low 18.67 -0.04 18.63 18.63 50,051 22,999

AM Official 18.67 -0.04

Kerb close 18.63 -0.04

Open int. 18.63 -0.04

Total 18,232 18,232

NATURAL GAS NYMEX (10,000 cu ft; \$/cu ft)

Close 48.70 -0.17 48.53 48.53 21,138 9,500

Previous 48.70 -0.17 48.53 48.53 21,138 9,500

High/Low 48.70 -0.17 48.53 48.53 21,138 9,500

AM Official 48.70 -0.17

Kerb close 48.53 -0.17

Open int. 48.53 -0.17

Total 18,232 18,232

UNLEADED GASOLINE NYMEX (42,000 US gal; \$/barrel)

Close 18.67 -0.04 18.63 18.63 50,051 22,999

Previous 18.67 -0.04 18.63 18.63 50,051 22,999

High/Low 18.67 -0.04 18.63 18.63 50,051 22,999

AM Official 18.67 -0.04

Kerb close 18.63 -0.04

Open int. 18.63 -0.04

GRAINS AND OIL SEEDS

WHEAT LCE (\$ per tonne)

Close 124.90 -0.50 124.40 124.40 544 45

Previous 124.90 -0.50 124.40 124.40 544 45

High/Low 124.90 -0.50 124.40 124.40 544 45

AM Official 124.90 -0.50

Kerb close 124.40 -0.50

Open int. 124.90 -0.50

Total 124.90 -0.50

WHEAT CBT (5,000 bu; min. conts/500 bushels)

Close 389.4 -0.76 389.4 389.4 12,664

Previous 389.4 -0.76 389.4 389.4 12,664

High/Low 389.4 -0.76 389.4 389.4 12,664

AM Official 389.4 -0.76

Kerb close 389.4 -0.76

Open int. 389.4 -0.76

Total 12,664 12,664

MAIZE CBT (5,000 bu; min. conts/500 bushels)

Close 279.2 -0.50 279.2 279.2 12,664

Previous 279.2 -0.50 279.2 279.2 12,664

High/Low 279.2 -0.50 279.2 279.2 12,664

AM Official 279.2 -0.50

Kerb close 279.2 -0.50

Open int. 279.2 -0.50

Total 12,664 12,664

BARLEY LCE (\$ per tonne)

Close 105.00 -0.50 104.50 104.50 105 10

Previous 105.00 -0.50 104.50 104.50 105 10

High/Low 105.00 -0.50 104.50 104.50 105 10

AM Official 105.00 -0.50

Kerb close 104.50 -0.50

Open int. 105.00 -0.50

Total 105.00 -0.50

SOYABEANS CBT (5,000 bu; min. conts/500 bushels)

Close 584.2 -0.50 584.2 584.2 12,664

Previous 584.2 -0.50 584.2 584.2 12,664

High/Low 584.2 -0.50 584.2 584.2 12,664

AM Official 584.2 -0.50

Kerb close 584.2 -0.50

Open int. 584.2 -0.50

Total 12,664 12,664

SOYABEANS MEAL CBT (100 tons; \$/ton)

Close 173.0 -0.18 173.0 173.0 12,664

Previous 173.0 -0.18 173.0 173.0 12,664

High/Low 173.0 -0.18 173.0 173.0 12,664

AM Official 173.0 -0.18

Kerb close 173.0 -0.18

Open int. 173.0 -0.18

Total 12,664 12,664

POTATOES LCE (\$/tonne)

Close 10.50 -0.10 10.40 10.40 105 10

Previous 10.50 -0.10 10.40 10.40 105 10

High/Low 10.50 -0.10 10.40 10.40 105 10

AM Official 10.50 -0.10

Kerb close 10.40 -0.10

Open int. 10.50 -0.10

Total 105.00 -0.10

PEACHES (SIFTEX) (\$/100 index point)

Close 2000 +30 1990 1970 418 55

Previous 2000 +30 1990 1970 418 55

High/Low 2000 +30 1990 1970 418 55

AM Official 2000 +30

Kerb close 1990 +30

Open int. 2000 +30

Total 418 55

PEACHES (SIFTEX) (\$/100 index point)

INTERNATIONAL CAPITAL MARKETS

Germany falls on Bundesbank caution

By Graham Bowley in London and Lisa Branstetter in New York

Disappointment over the Bundesbank's decision to leave interest rates on hold at yesterday's council meeting pushed German government bonds lower yesterday.

Although the market consensus was for no change in monetary policy at yesterday's meeting, traders reacted negatively to comments by council members, including Dr Oskar Lafontaine, the chief economist, which suggested that the central bank would continue to be cautious towards interest rates.

A weaker US Treasury market also acted as a downward influence, as bond prices across most of the European markets slid lower.

The yield on the 10-year benchmark bond rose to 6.74 per cent, while the September bond futures contract traded on a life in London fell back to 94.02, down 0.34 on the day.

The 10-year bond yield spread over US Treasuries settled at around 51 basis points.

Traders also cited some selling by US hedge funds of the European government bond holdings as another reason for falling prices across Europe. "This selling hit the gilt and bond market earlier in the week and the French market yesterday," said Mr Ian Williams, gilt specialist at Kleinwort Benson in London.

The 7.5 per cent 2005 French government bond fell 0.40 to 100.09. The September national futures contract on Mifit settled at 114.96, down 0.52.

Dealers said that attention today will be on the G7 meeting in Canada, although trading is expected to be quiet with German financial markets closed for a holiday.

■ The weaker tone in Europe and the US dragged UK government bonds lower, in spite of supportive economic data.

Gilts were hardly moved by the announcement by Mr Kenneth Clarke, the chancellor, of the extension of the government's existing target for UK inflation beyond the next general election.

The announcement came in after-hours trading and was largely in line with traders' expectations.

GOVERNMENT BONDS

"It is fairly neutral for the market," said Mr Stephen Hannan, director of research at IBI. "It does not suggest any easing or watering down of its commitment to keeping inflation down."

Gilts were supported in early trading by labour market statistics showing modest average earnings growth, but prices fell back in later trade. The long gilt future on Liffe was down 0.34 in late trading. The

10-year yield spread over bunds was at 146 basis points, while the spread over US Treasuries stood at 197 basis points.

■ US Treasury bonds yesterday gave up some of the gains made after Tuesday's rally as traders took profits and tried to assess the course of monetary policy.

Figures on non-farm productivity showed easing was pressures. The Commerce Department reported that productivity rose 0.7 per cent, up from the previous estimate of 0.7 per cent, and that unit labour costs increased 1.6 per cent, less than the earlier estimate of a 3.4 per cent rise.

Attention was focused on May capacity utilisation and industrial production data due today for clues on the economy in the second quarter.

The dollar gave little in the way of direction for the market, as a consortium of shareholders retain ownership of 25 per cent of the company's shares, with management owning the remaining 5 per cent. CWB and the consortium will reduce their share of the equity to 15 per cent if the "greenhouse" is exercised.

CWB sells 70% stake in Swedish textile group

By Antonia Sharpe

CWB Capital Partners, the London-based acquisition fund which specialises in buying market-leading manufacturing companies in northern Europe, yesterday raised \$38m when it sold off 70 per cent of IBO, the Swedish textile production manufacturer in an international equity offering.

CWB bought IBO, the world's biggest producer of yarn feeding equipment, from Handel och Industri, the industrial holding company of Sweden's Svenska Handelsbanken, last December.

The sale was a consortium of shareholders retain ownership of 25 per cent of the company's shares, with management owning the remaining 5 per cent. CWB and the consortium will reduce their share of the equity to 15 per cent if the "greenhouse" is exercised.

Mr Knut Rangel of Merrill Lynch, which arranged the sale, said other medium-sized Swedish companies could look abroad to raise money. "There is increasing international interest in these types of companies," he said.

Meff Renta Fija, the Spanish funds and options exchange based in Barcelona, has obtained permission from the US Commodity Futures Trading Commission to allow US investors to trade its options, writes Graham Bowley.

Government bond and Madrid interbank offered rate (Mibor) option contracts traded on Meff may now be offered to US investors. Government bond and Mibor futures contracts can already be sold directly into the US.

Sanctuary housing group raises £50m

By Simon Kuper

Hambros Bank has arranged a \$50m loan for Sanctuary Housing Association. The bank claims this is the largest loan ever made to a British housing association.

The main providers of housing for the poor, associations manage more than 900,000 homes in the UK.

Hambros, which arranged the loan, will supply £20m, with £30m coming from Abbey National Treasury Services. The loan matures in three years, but is provided on a revolving basis.

Mr David Knowlton, finance director of Sanctuary, said the interest rate on the loan was 30 basis points inside the previous facility we had with NatWest.

In recent UK deals, associations have borrowed long-term funds at 150 to 170 basis points over gilt rates.

The loan is unsecured for the initial period, to make it easier for Sanctuary to draw down. Afterwards, security will comprise a floating charge, to be replaced by fixed charges on residential property.

The fixed charges will provide an asset cover ratio of 125 per cent, which Hambros said was "amongst the lowest seen in the sector".

Housing associations have borrowed about \$7bn since the Housing Act of 1988 made them partly reliant on private capital.

Mr Derek Gordon, a Hambros manager, said: "The market at the moment is the most beneficial housing associations will have seen ever."

He said there was a "huge supply" of funding, as banks were underlent, and "little demand for loans, as associations had seen a fall in government grants from £1.8bn in 1993-94 to £1.15bn this year."

Mr Knowlton said his had become more willing to lend since one or two UK associations, including Sanctuary, had applied for credit ratings. He said: "This deal wasn't difficult to put together with Hambros and Abbey National."

He said Sanctuary was considering another US bond issue. Last November, it became the first housing association to raise funds on the American market, with a \$70m issue.

The association, which manages more than 21,000 homes and is based in Hertford, is among the 10 largest housing associations in the UK.

British Gas offers to buy back 50-year issue

By Antonia Sharpe

British Gas yesterday offered to buy back the 50-year issue of 50-year eurobonds issued at the beginning of last year and replace them with a £200m issue of 30-year eurobonds.

Tax was widely seen as the main motive behind the deal, which is being arranged by HSBC.

INTERNATIONAL BONDS

British Gas stands to make a tax-free gain of as much as \$30m if it buys back all the 50-year bonds. They had been issued at par but have since dropped to about 82.

The buy-back comes two weeks after the Inland Revenue announced changes to the taxation of UK government bonds and corporate bonds.

At present no capital gains tax is charged on profits made when bonds are bought or sold. However, the Inland Revenue proposes to tax total returns earned on holdings of all bonds, charging tax on both interest payments and on any capital gain.

An official at British Gas acknowledged that the exchange worked in favour of the company but said tax was not the main reason but the need for new funding. If all the old bonds are bought back, British Gas will increase its net borrowing by \$40m.

HSBC said the buy-back provided a way out for holders of the 50-year bonds, which have become illiquid. HSBC is offering 47 basis points over the 8% per cent gilt due 2017. They had traded at a margin of 59 basis points before the deal was announced.

NEW INTERNATIONAL BOND ISSUES

| Borrower | Amount | Coupon | Price | Maturity | Yield | Spread | Book runner |
|--|--------|--------|---------|----------|--------|-------------|-------------------------|
| KW International Finance | 300m | 2.50 | 100.175 | Jul 2001 | 0.275 | +53.5% (17) | Mitsubishi Finance Int. |
| STERLING British Gas | 200 | (a) | (b) | Jun 2025 | 0.625L | +53.5% (17) | HSBC Markets |
| D-MARKS Dapo International Finance | 100 | 7.125 | 102.35 | Jul 2005 | 3.00 | | DG Bank |
| FRENCH FRANCES Sanofi-Synthelabo | 5.5bn | 4.00 | (b) | Jan 2000 | 2.50 | | Société Générale |
| GUILLERMO Ford Motor Credit Corp. | 200 | 6.375 | 99.94F | Jul 2000 | 0.30F | +40.5% (10) | ABN Amro Hoare Govett |
| CANADIAN DOLLARS Province of New Brunswick | 150 | 7.625 | 99.55F | Jul 2000 | 0.275F | +25.5% (10) | Wood Gundy |
| GEC Canada | 100 | 8.00 | 99.15F | Jul 2000 | 0.325F | +15.0% (14) | Hambros Bank |

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MARKETS REPORT

Buba comments on interest rates worry markets

Markets were yesterday unimpressed by comments from senior Bundesbank officials which prompted a rethink on the outlook for German interest rates, writes Philip Gault.

The central bank's decision to leave rates on hold after its council meeting was not unexpected, but comments from Mr. Oskar Lafontaine, the chief economist, said that inflation dangers remained, while Mr. Hans Eichel, the finance minister, was taken as hawkish by the market.

The prospect of German rates staying unchanged longer than had previously been anticipated, put the dollar under some pressure. It finished in London at DM1.3974 from DM1.4044, and at ¥84.255 from ¥84.16.

The overall currency market trading remained on the defensive, with the dollar down against the pound, which starts in London tomorrow. With the dollar stuck in a fairly narrow range, little independent action is likely on the European crosses.

or from sterling.

The D-Mark was slightly lower in Europe, finishing at FF70.508 against the French franc from FF73.521.

Sterling had a good day, starting on a high against both the D-Mark and dollar. It closed at DM2.2496, from DM2.2394, and \$1.6099 from \$1.5946. The trade weighted index rose to 84.7 from 84.3.

A hint of what to expect from the Bundesbank came early in the day when Mr. Ernst Weitzel, president of the regional central bank in Hesse/Thuringen told reporters: "Interest rate decisions are rather unlikely at council meetings outside of Frankfurt." The Bundesbank council met in Magdeburg, part of the former East Germany.

What later emerged was perhaps not as remarkable as the market made out. Ms. Allison Cottrell, analyst at Paine Webber in London, said what was most noticeable about the press conference that followed the meeting was the complete lack of content. She surmised that this reflected a lack of consensus in the council, with vague generalities being the easiest way to paper over differences.

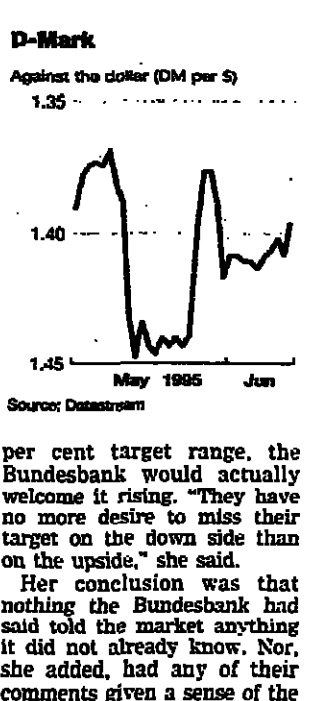
"Their neutral stance is always slightly cautious," said Ms. Cottrell.

The Paine Webber analyst also said the market's concerns appeared slightly misplaced. "The market has taken a set of comments that say nothing in a very negative light," she said. "This was particularly the case regarding Mr. Lafontaine's comments that M3 growth was on an upward trend."

Ms. Cottrell argues that with M3 growth actually negative recently, and well below the 4-6

per cent target range, the Bundesbank would actually welcome it rising. "They have no more desire to miss their target on the down side than on the upside," she said.

Her conclusion was that nothing the Bundesbank had said today would change anything. It did not already know, she added, had any of their comments given a sense of the



likely timing of a move in interest rates.

Mr. Robin Marshall, chief economist at Chase Manhattan in London, said the Bundesbank had simply confirmed it was "as stung as ever in terms of their easing schedule." He said he was in little doubt German rates would be cut again, but predicted a "slow grind down."

Whether this trend will help the dollar is open to doubt. As Mr. Marshall notes, for the first time in five years, the three leading economies are all falling at once. This presents an argument, he says, for a generalised deflation, so relative interest rate differentials may stay substantially unchanged.

The confirmation of the government's 1-1/2 per cent inflation target appeared to lend further support to sterling in late trading. Some of the earlier rally in sterling/dollar was attributed

by traders to options-related short covering.

Mr. Marshall at Chase said sterling's stable performance probably owed something to a rebuilding of the credibility of Mr. Kenneth Clarke, the chancellor, over the past month. Renewed talk of a leadership challenge to the prime minister, however, will probably cap any upside gains.

In its daily operations the Bank of England provided £205m late assistance, and £114m at established rates, after forecasting a £550m shortage.

Futures prices lost ground in line with gilts and bonds, with the December short sterling contract closing at 92.56 from 92.92.

POUND SPOT FORWARD AGAINST THE POUND

| Jun 14 | Closing | Change | Open | High | Low | Rate | %P | Bank |
|--------------|-----------|---------|---------|----------|----------|------|----------|------|
| Jun 14 | Mid-point | Change | Open | High | Low | Rate | %P | Bank |
| Europe | 15.8162 | -0.0016 | 15.8162 | 15.7700 | 15.7951 | 1.8 | 15.7478 | 1.8 |
| Australia | 16.1947 | -0.0011 | 16.1947 | 16.1300 | 16.1297 | 1.7 | 16.0997 | 1.7 |
| Canada | 8.7857 | -0.0011 | 8.7857 | 8.7333 | 8.7303 | 0.5 | 8.7611 | 0.2 |
| Denmark | 7.8331 | -0.0008 | 7.8331 | 7.8100 | 7.8100 | 0.2 | 7.8100 | 0.2 |
| France | 2.2496 | -0.0012 | 2.2496 | 2.2450 | 2.2452 | 0.1 | 2.2378 | 0.1 |
| Germany | 363.231 | -0.0005 | 363.231 | 363.1800 | 363.1800 | 0.1 | 363.1800 | 0.1 |
| Greece | 10.0000 | -0.0003 | 10.0000 | 9.9997 | 9.9997 | 0.1 | 9.9997 | 0.1 |
| Ireland | 2.2496 | -0.0012 | 2.2496 | 2.2450 | 2.2452 | 0.1 | 2.2378 | 0.1 |
| Italy | 16.1947 | -0.0011 | 16.1947 | 16.1300 | 16.1297 | 1.7 | 16.0997 | 1.7 |
| Japan | 84.255 | -0.0011 | 84.255 | 84.2000 | 84.2000 | 0.1 | 84.2000 | 0.1 |
| Netherlands | 2.2496 | -0.0012 | 2.2496 | 2.2450 | 2.2452 | 0.1 | 2.2378 | 0.1 |
| Norway | 10.0000 | -0.0003 | 10.0000 | 9.9997 | 9.9997 | 0.1 | 9.9997 | 0.1 |
| Portugal | 2.2496 | -0.0012 | 2.2496 | 2.2450 | 2.2452 | 0.1 | 2.2378 | 0.1 |
| Spain | 16.1947 | -0.0011 | 16.1947 | 16.1300 | 16.1297 | 1.7 | 16.0997 | 1.7 |
| Sweden | 10.0000 | -0.0003 | 10.0000 | 9.9997 | 9.9997 | 0.1 | 9.9997 | 0.1 |
| Switzerland | 2.2496 | -0.0012 | 2.2496 | 2.2450 | 2.2452 | 0.1 | 2.2378 | 0.1 |
| UK | 1.6099 | -0.0005 | 1.6099 | 1.6094 | 1.6094 | 0.1 | 1.6094 | 0.1 |
| US | 1.6099 | -0.0005 | 1.6099 | 1.6094 | 1.6094 | 0.1 | 1.6094 | 0.1 |
| South Africa | 1.6099 | -0.0005 | 1.6099 | 1.6094 | 1.6094 | 0.1 | 1.6094 | 0.1 |
| South Korea | 1.6099 | -0.0005 | 1.6099 | 1.6094 | 1.6094 | 0.1 | 1.6094 | 0.1 |
| Thailand | 1.6099 | -0.0005 | 1.6099 | 1.6094 | 1.6094 | 0.1 | 1.6094 | 0.1 |

DOLLAR SPOT FORWARD AGAINST THE DOLLAR

| Jun 14 | Closing | Change | Open | High | Low | Rate | %P | Bank |
|--------------|-----------|---------|--------|--------|--------|------|--------|------|
| Jun 14 | Mid-point | Change | Open | High | Low | Rate | %P | Bank |
| Europe | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Australia | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Canada | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Denmark | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| France | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Germany | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Greece | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Ireland | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Italy | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Japan | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Netherlands | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Norway | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Portugal | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Spain | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Sweden | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Switzerland | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| UK | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| US | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| South Africa | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| South Korea | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Thailand | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |

CROSS RATES AND DERIVATIVES

| EXCHANGE CROSS RATES | Jun 14 | Change | Open | High | Low | Rate | %P | Bank |
|----------------------|-----------|---------|--------|--------|--------|------|--------|------|
| Jun 14 | Mid-point | Change | Open | High | Low | Rate | %P | Bank |
| Belgium | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Denmark | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| France | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Germany | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Italy | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Netherlands | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Norway | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Portugal | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Spain | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Sweden | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Switzerland | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| UK | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| US | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| South Africa | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| South Korea | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |
| Thailand | 1.3974 | -0.0011 | 1.3974 | 1.3974 | 1.3974 | 0.1 | 1.3974 | 0.1 |

JAPANESE YEN FUTURES (¥100 Yen 12.5m per Yen 100)

| Open | Close | Change | High | Low | Est. vol | Open Int. |
|--------|--------|--------|--------|--------|----------|-----------|
| Jun 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |
| Jul 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |
| Aug 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |
| Sep 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |
| Oct 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |
| Nov 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |
| Dec 14 | 117.00 | -0.10 | 117.00 | 116.90 | 116.90 | 116.90 |

STERLING EUROPEAN CURRENCY UNIT RATES

| Jun 14 | Rate | Change | % Chg | Open | High | Low | Est. vol | Open Int. |
|--------|--------|---------|-------|--------|--------|--------|----------|-----------|
| Jun 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |
| Jul 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |
| Aug 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |
| Sep 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |
| Oct 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |
| Nov 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |
| Dec 14 | 1.3974 | -0.0011 | -0.08 | 1.3974 | 1.3974 | 1.3974 | 1.3974 | 1.3974 |

UK INTEREST RATES

| LONDON MONEY RATES | Jun 14 | Change | Open | High | Low | Rate | %P | Bank |
|--------------------|-----------|--------|-------|-------|-------|-------|-----|-------|
| Jun 14 | Mid-point | Change | Open | High | Low | Rate | %P | Bank |
| Interbank Sterling | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| Bank of England | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| 3 month | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| 6 month | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| 12 month | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| 3 month | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| 6 month | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |
| 12 month | 7 1/2 | -0.1 | 7 1/2 | 7 1/2 | 7 1/2 | 7 1/2 | 0.1 | 7 1/2 |

THREE MONTH STERLING FUTURES (LFF) £500,000 points of 100%

| Open | Close | Change | High | Low | Est. vol | Open Int. |
|--------|-------|--------|-------|-------|----------|-----------|
| Jun 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |
| Jul 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |
| Aug 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |
| Sep 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |
| Oct 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |
| Nov 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |
| Dec 14 | 93.37 | -0.01 | 93.37 | 93.37 | 93.37 | 93.37 |

THREE MONTH EURO DOLLAR FUTURES (LFF) \$1m points of 100%

| Open | Close | Change | High | Low | Est. vol | Open Int. |
|--------|-------|--------|-------|-------|----------|-----------|
| Jun 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |
| Jul 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |
| Aug 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |
| Sep 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |
| Oct 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |
| Nov 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |
| Dec 14 | 94.50 | -0.05 | 94.50 | 94.50 | 94.50 | 94.50 |

BASE LENDING RATES

| Bank | Rate | Bank | Rate | Bank | Rate | Bank | Rate |
|-----------------|------|------------------|------|-----------------|------|-----------------|------|
| Adem & Co. | 7.75 | Barclays Bank | 7.75 | Bank of England | 7.75 | Bank of Ireland | 7.75 |
| Alfred Jones | 7.75 | Bank of Scotland | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |
| Bank of America | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |
| Bank of America | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |
| Bank of America | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |
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| Bank of America | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |
| Bank of America | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |
| Bank of America | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 | Bank of Wales | 7.75 |

THREE MONTH EURO DOLLAR FUTURES (LFF) \$1m points of 100%

INVESTMENT TRUSTS - Cont.**INVESTMENT TRUSTS - Cont**

| | Index | Price | % Chg |
|------------------------|-------|-------|-------|
| Roaming Overseas - 100 | | 167 | |
| For & Col Euro - 100 | | 140 | |
| For & Col Euro - 100 | | 125 | |
| For & Col Euro - 100 | | 125 | |
| For & Col Euro - 100 | | 61 | |
| For & Col Euro - 100 | | 228 | |
| For & Col Euro - 100 | | 77 | |
| For & Col Euro - 100 | | 77 | |
| For & Col Euro - 100 | | 28 | |
| For & Col Euro - 100 | | 36 | |
| For & Col Euro - 100 | | 67 | |
| For & Col Euro - 100 | | 71 | |
| For & Col Euro - 100 | | 33 | |
| For & Col Euro - 100 | | 167 | |
| For & Col Euro - 100 | | 47 | |
| For & Col Euro - 100 | | 174 | |
| For & Col Euro - 100 | | 103 | |

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REFERENCES

INVESTMENT COMPANIES - Cont.**OIL EXPLORATION & PRODUCTION - Cont****PROPERTY - Cont****SPIRITS WINES & CIDERS****TRANSPORT Cont.**[illegible][illegible][illegible]

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MANAGED FUNDS: MISSED NOTES

Primes are in particular demand, indicating confidence and strong buying interest. The market is looking for a rise in dollar prices. Funds are looking for all working markets.

There is a heavy volume of business in interest rates subject to the following:

- 1) Futures are not accepted. The regulatory authorities are not clear.
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AMERICA Equities turn positive after early declines

Wall Street

US share prices turned positive in early afternoon trading yesterday after a morning in which investors took profits off the top of Tuesday's gains, writes Lisa Branstetter in New York.

The Dow Jones Industrial Average moved as much as 20 points lower in morning trading but managed to push into positive territory after midday. At 1 pm the Dow was 0.69 ahead at 4,485.30, while the Standard & Poor's 500 was off 0.27 at 535.78. The American SE composite climbed 5.22 to 496.63 and the Nasdaq composite gained 0.19 at 894.42. New York SE volume amounted to 187m shares.

Both the stock and bond markets had swung up and down markedly since the beginning of this month as investors speculated about the course of monetary policy. Yesterday's data, showing strong productivity gains in the first quarter and a modestly higher than expected inventory growth in April, drew little reaction because the figures were too old to provide much insight about

the second quarter.

Cyclical shares fell amid uncertainty about Fed policy and the strength of the economy. The Morgan Stanley index of cyclical shares fell 0.6 per cent while the counterpart index of consumer shares remained flat. Declining cyclical shares included Rohm & Haas, which fell 2 1/2% at \$51.40 after saying that it did not expect second quarter net income to exceed that of the same period last year. Honeywell fell 1 1/2% at \$40.75 and Eaton lost 1 1/2% at \$58.75.

Shares in companies that provide managed healthcare fell sharply after Humana said that it expected second quarter earnings to be below analysts' estimates due to rising medical costs. Humana lost 1 1/2 per cent at \$19.50, United Healthcare 3/4% at \$40. Mid Atlantic Medical Services dropped 1 1/2% and Foundation Health 1 1/4% at \$24. On the Nasdaq, Oxford Health Plans fell 2 1/2% at \$55.75, US Healthcare 1 1/4% at \$33.34, FHP International 1 1/4% at \$22.40 and Pacific Health Systems 1 1/4% at \$67.75.

Cor Therapeutics lost nearly 47 per cent or \$8% at \$10.40 after reporting unfavorable results from the test of a drug

developed to treat patients undergoing coronary angioplasty surgery.

Canada

Toronto resisted the New York slide with help from gold and the consumer products division. The TSE 300 Composite Index was 2.50 higher at 4,494.60 at 1 pm, with the gold and precious metals index up 101.28 at 10,548.76 as bullion reached \$387.75 an ounce in London.

Industrials were generally weak but consumer products, like gold, put on a percentage point. Seagram continued to gain on the MCA/DreamWorks distribution deal, adding C\$4.34%.

SOUTH AFRICA

Johannesburg posted some late gains as the 2 billion price made ground in New York. However, sentiment remained nervous on the uncertain outlook for interest rates, which could hit earnings growth prospects in the industrial sector. The overall index was 4.1 better at 5,410.8, industrials picked up 6.7 to 6,791.5 and golds added 11.5 at 1,402.5.

EUROPE

Extended cloud cover for Paris bourse

Bourses got no lift from the Dow in yesterday's European afternoon, writes Our Markets Staff. Indeed, the main transatlantic influence was weakness in the dollar: depressive but, in most capital cities, not exactly surprising.

PARIS, however, traded under several clouds: there was nuclear testing, dollar weakness, and disappointment at the lack of a German interest rate cut; unhappiness in the automotive sector; a row between Suez and its major corporate shareholders; and the imposition of "judicial control" upon Mr Guy Dejouany, chairman of Générale des Eaux, in connection with a 1991 bribery probe.

The combination was too much for the equity market, where the CAC-40 index fell 35.14 or 1.5 per cent to 1,893.65 and where turnover rose again from FF4.03bn to FF5.3bn.

Financials were generally weak but Axa, down FF8.80 at FF255.20, had more than the Dax index to worry about. Mr Michel Woodcock at Williams de Broët noted that Axa's proposed takeover of National Mutual in Australia, a major international strategic move, needed 65 per cent approval.

from the target's policyholders, who were likely to be prejudiced by the French decision to resume nuclear testing in the South Pacific.

Among automotive stocks, Valeo dropped FF7.10 more to FF245.90 and Renault played catch-up with a fall of FF4.70 to FF153.10. Générale des Eaux lost FF15 at FF650 and Suez FF3.10 at FF259.50.

FRANKFURT traded quietly ahead of today's Corpus Christi holiday, turnover easing from DM5.9bn to DM5.6bn as the Dax index closed the post-bourse just 0.59 firmer at an index of 2,124.84, after a morning high of 2,127.75 and a session close of 2,128.02.

The Bundesbank's decision to hold interest rates came as no surprise here. The main share price initiatives of the day, indeed, were taken with a view to 1996 as the big retailers, Karstadt and Kaufhof, rose by DM11.50 to DM598.50 and DM11 to DM492.50 respectively. Mr Eckhard Frahm at Merck Finck in Düsseldorf said that traders, once again, were looking ahead to a tax package which should be published next month, which should give some hope for consumer spending and which should take

FT-SE Actuaries Share Indices

| | | THE EUROPEAN SERIES | | | | | | | | | |
|---------------------|--|---------------------|---------|---------|---------|---------|---------|---------|---------|---------|---------|
| | | Jun 14 | Jun 13 | Jun 12 | Jun 11 | Jun 10 | Jun 9 | Jun 8 | Jun 7 | Jun 6 | Jun 5 |
| FT-SE Actuaries 100 | | 1362.23 | 1362.42 | 1361.97 | 1360.77 | 1358.88 | 1356.30 | 1351.13 | 1351.12 | 1351.12 | 1351.12 |
| FT-SE Actuaries 200 | | 1455.50 | 1454.02 | 1454.78 | 1452.78 | 1450.18 | 1447.77 | 1448.22 | 1448.22 | 1448.22 | 1448.22 |

| | | Jun 13 | Jun 12 | Jun 11 | Jun 10 | Jun 9 | Jun 8 | Jun 7 | Jun 6 | Jun 5 |
|---------------------|--|---------|---------|---------|---------|---------|---------|---------|---------|---------|
| FT-SE Actuaries 100 | | 1354.19 | 1350.53 | 1350.31 | 1351.18 | 1351.18 | 1351.18 | 1351.18 | 1351.18 | 1351.18 |
| FT-SE Actuaries 200 | | 1447.38 | 1446.08 | 1445.28 | 1445.88 | 1445.88 | 1445.88 | 1445.88 | 1445.88 | 1445.88 |

Base: 1990 (S&P500: Highgate: 100 - 1362.23; 200 - 1455.50; London: 100 - 1351.13; 200 - 1448.22; Paris: 100 - 1351.13; 200 - 1448.22)

effect next year.

ZURICH was unable to make progress in the face of the dollar's earlier tone and ahead of Friday's Swiss election. The SMI index dipped 2.5 to 2,788.1, with easier bond futures adding to the pressure after the Bundesbank's decision to leave rates unchanged.

Second-tier stocks continued to catch up, having been largely left out of last week's strong rally. Oerlikon-Buehler closed SF5.50 higher at SF110.50. Holderbank rose SF1.30 to SF9.95 and Swissair gained SF0.75 at SF7.75. Better registered jumped SF1.50 or 4.4 per cent to SF3.63, with its takeover of a US car supplier seen as positive for the company.

Certificates in SGA, which controls 75 per cent of bill-board space in Switzerland,

jumped SF2.20 or 4.8 per cent to SF7.40; the company held its first analysts' meetings earlier in the week.

MILAN was flat, with selling by banks and mutual funds prompting some brokers to suggest that the funds might be feeling the impact of redemptions. The Comit index put on 1.46 at 606.81 and the real-time Mibtel index finished 8 lower at 9,757 after a session heavily influenced by the close of the monthly account and the June futures contract.

Fiat remained under pressure, weakening 1/2 to L5.90, with Tuesday's presentation to analysts failing to dispel worries about the first-quarter performance.

Edison, said to have been heavily bought by one Milan based broker, moved forward L1.99 to L6.852, while Italgas,

finding favour in recent sessions, appreciated a further L43 to L4.388.

AMSTERDAM was pulled lower by a slip in German and Dutch bond prices after the Bundesbank's interest rate decision, the AEX index closing 1.26 off at 430.57. The retailer Ahold retreated 40 cents to F162.90 ahead of the first-quarter figures, due today.

Profit-taking in Ericsson and Nokia hit the STOCKHOLM and HELSINKI markets yet again, the telecoms stocks dropping SKR14 to SKR537 and FMS to FMS206 respectively, and dragging other shares down with them. The Affarsvarlden General index ended 15.9 lower at 1,588.0, and the Hex dropped 17.0 to 1,853.3.

TEL AVIV hit a new 1996 high, the Mishkanim index rising 3.90 or 2.1 per cent to 191.00 and turnover rocketing from Shk110m to Shk189m as rumours circulated that Cable and Wireless was willing to pay Shk300 a share to raise its 7.01 per cent stake in Bezeq Israel Telecom. Bezeq saw Shk36.4m trade by itself as it jumped 10 per cent to Shk792.

Written and edited by William Cochrane and Michael Morgan

Argentina hit by car exports fears

Buenos Aires fell 2.1 per cent in morning trade, hurt by the prospect of curbs on its car exports to Brazil, which had been helping Argentina to reduce its trade deficit.

The Merval index, which had rebounded earlier this week after last week's 11 per cent loss, was standing 8.88 lower at 405.19.

Brokers noted that Brady bonds and ADRs showed heavy falls on Wall Street, although it was still unclear whether car import quotas,

under study by Brazil, would apply to the Mercosur customs union, of which it is a member. SAO PAULO picked up from early lows but was still weak in midday trade on speculative selling during the day's futures index settlement. The Bovespa index was down 215 at 37,674 at 1 pm, in low turnover of \$319.56m (\$215.6m).

MEXICO CITY saw early profit-taking after Monday's gains and the IPC index was 12.41 easier at 1,971.36 in morning trade.

ASIA PACIFIC

Hong Kong climbs 2.9% on US rate hopes

Expectations of a cut in US interest rates and the removal of uncertainties over Citic Pacific's holding in HK Telecom took Hong Kong 2.9 per cent higher.

The Hang Seng index rose 261.60 to finish at the day's best of 9,364.77, although analysts cautioned that while turnover of HK\$3.6bn was a marked improvement on Tuesday's HK\$2.4bn, it was still not enough to suggest the start of another bull run.

The property sector was the main beneficiary of expectations of a US interest rate reduction, which would feed through to local rates.

The property index outperformed other sub-indices, gaining 3.9 per cent. Cheung Kong rose HK\$1.70 to HK\$38.80, supported by an encouraging response to a sale of new apartments and rumours of a covered warrants issue.

HK Telecom advanced 45 cents to HK\$15.55 on news that Citic Pacific, 70 cents higher at HK\$19.95, continued to hold its 12 per cent stake. Analysts were sanguine about news that Citic's parent company, Citic Hong Kong, which is not listed, was the seller of film shares since February.

Tokyo

Reports that the US and Japan will resume talks in Geneva in an effort to reach a compromise over bilateral car trade supported the automobile sector; the Nikkei index closed marginally higher, led by export-oriented stocks, writes Emilio Terazono in Tokyo.

The 225 average was up 60.81 at 14,680.49 after moving in a narrow range between 14,634.22 and 14,801.44. Broadly based buying by institutional investors in early trading prompted a rise in the futures market, which in turn triggered arbitrage trading. Share prices gave up some of their gains in the afternoon on small-lot profit-taking by brokers.

Volume came to 257m shares, against 319.8m. The Topix index of all first section stocks put on 3.17 at 1,196.38 and the Nikkei 300 edged up 0.84 to 223.10. Rises led declines by 497 to 468, with 203 issues

unchanged. In London the ISE/Nikkei 50 index was 2.39 firmer at 982.60.

Reports that Mr Ryutaro Hashimoto, the trade minister, had announced a vice ministerial level meeting in Geneva on June 22 and 23 between the US and Japan over car enclosures encouraged investors. However, some brokers said the rebound was largely technical, following the Nikkei's decline of some 1,000 points over the past four days.

Carmakers advanced, the sector rising 1.2 per cent. Toyota Motor gained Y10 at Y1,620 and Nissan Motor Y9 at Y1,584. The rise here helped other exporters, especially high-technology issues which had plunged over the past few days on short selling by dealers. Sony rallied Y40 to Y3,840 and Kyocera Y40 to Y6,300.

Shiseido, the cosmetics maker, fell Y22 to Y974 on reports that the Fair Trade Commission, the anti-trust watchdog, was planning to issue a warning over the company's alleged arm twisting of its retailers over prices. Retailers had complained that Shiseido had stopped supplies following sales of its cosmetics at discount prices.

Japan Tobacco, the tobacco monopoly which was privatised last year, receded Y6,000 to Y720,000. Traders said individual investors facing margin calls were being forced to liquidate their holdings.

Some banks continued to lose ground on small-lot profit-taking. Dai-ichi Kangyo Bank slipped Y10 to Y1,570 and Bank of Tokyo was also off Y10, at Y1,440.

In Osaka, the OSE average moved up 16.82 to 15,738.49 in volume of 8.7m shares. Machinery stocks were bought back.

Rohm improved Y40 to Y3,870 and Shima Seiki advanced Y190 to Y3,700.

Roundup

The rest of the region, too, offered wide variations in performance.

TAIPEI dropped 1.8 per cent, hitting a 14-month low for a second consecutive session as recent reports of bounced cheques and financial troubles at several domestic construction groups severely damaged investor confidence.

Textiles and papers were hit hard, falling 4.4 and 3.5 per cent as the weighted index shed 99.96 to 5,413.74. However, turnover was the lowest since April 1 last year at T\$34.99bn.

SYDNEY worried about domestic interest rate prospects and the All Ordinaries index lost 12.4 at 1,966.5. The

transport, security and health care conglomerate Mayne Nickless tumbled 38 cents to A\$5.80 after it downgraded its short-term profits outlook.

COLOMBO saw profits taken and the all-share index fell 8.87 to 741.88. But BOMBAY rose, the Sensex index closing 25.89 higher at 3,324.86 at the beginning of a new account in "A" group shares.

The day's other rallies included BANGKOK, up 1.2 per cent as investors snapped up what they considered to be bargain-priced finance issues, the SET index firming 15.89 to 1,587.88 in turnover of \$88m.

KARACHI held a special, late session to trade on the Pakistani budget. The withdrawal of tax exemption on "bonus" shares and issues hit the market, leaving the KSE 100-share index 21.41 or 1.3 per cent lower at 1,610.85.

EMERGING MARKETS: IFC WEEKLY INVESTABLE PRICE INDICES

| | | Dollar terms | | | Local currency terms | | |
|---------------|---------------|--------------|--------------------|------------------|----------------------|--------------------|------------------|
| | | June 9 1995 | % Change over week | % Change Dec '94 | June 9 1995 | % Change over week | % Change Dec '94 |
| Market | No. of stocks | | | | | | |
| Latin America | (254) | 458.90 | -4.6 | -20.9 | | | |
| Argentina | (30) | 672.19 | -10.3 | -8.5 | 412,389.93 | -10.2 | -8.5 |
| Brazil | (72) | 303.69 | -6.7 | -21.0 | 1,036.92 | -5.7 | -14.9 |
| Chile | (36) | 910.49 | +1.4 | +16.1 | 1,348.88 | +0.1 | +6.8 |
| Colombia | (16) | 763.55 | +10.5 | -3.9 | 1,178.97 | +10.0 | -1.4 |
| Mexico | (68) | 406.28 | -4.1 | -39.2 | 1,085.78 | -3.4 | -15.6 |
| Peru | (20) | 182.21 | -5.1 | -2.7 | 282.24 | -4.1 | -4.1 |
| Venezuela | (12) | 389.59 | -0.2 | -19.5 | 1,555.76 | -0.2 | -19.5 |
| Asia | (657) | 258.38 | -1.8 | +3.6 | | | |
| China | (20) | 70.96 | -0.6 | -6.5 | 74.43 | -0.7 | -8.1 |
| South Korea | (159) | 127.10 | -1.1 | -7.1 | 127.86 | -0.8 | -9.8 |
| Philippines | (22) | 295.73 | -0.3 | -0.8 | 368.24 | -0.6 | +4.8 |
| Taiwan, China | (33) | 128.48 | -2.3 | -2.9 | 123.90 | -2.3 | -2.9 |
| India | (101) | 101.95 | -0.7 | -17.4 | 113.78 | -0.7 | -17.3 |
| Indonesia | (42) | 108.95 | -0.7 | +9.2 | 131.59 | -0.7 | +10.5 |
| Malaysia | (114) | 302.07 | -2.4 | +12.4 | 272.05 | -2.9 | +7.4 |
| Pakistan | (36) | 282.66 | +3.7 | -22.8 | 397.15 | +3.7 | -22.4 |
| Sri Lanka | (19) | 139.08 | +10.9 | -22.6 | 143.84 | +11.3 | -22.4 |
| Thailand | (58) | 420.45 | -1.0 | +8.6 | 411.43 | -0.8 | +7.6 |
| Euro/Mid East | (219) | 137.58 | +0.3 | +16.1 | | | |
| Greece | (40) | 258.78 | +1.7 | +14.7 | 394.97 | +1.6 | +7.4 |
| Hungary | (5) | 126.84 | -0.4 | -16.4 | 186.34 | -0.3 | -9.8 |
| Jordan | (8) | 187.98 | +1.4 | +25.3 | 274.75 | +1.7 | +23.6 |
| Poland | (16) | 455.99 | +5.8 | -2.8 | 672.72 | +6.2 | -6.6 |
| Portugal | (28) | 125.17 | -0.2 | +3.4 | 128.28 | -1.3 | -4.7 |
| South Africa | (94) | 228.00 | -1.6 | +1.5 | 172.33 | -1.7 | -6.8 |
| Turkey | (44) | 181.85 | +18.2 | +48.4 | 3,883.91 | +12.4 | +86.6 |
| Zimbabwe | (5) | 259.76 | +3.5 | +6.2 | 325.20 | +3.7 | +7.9 |
| Composite | (1121) | 282.57 | -1.9 | -8.1 | | | |

Indices are calculated at end-week, and weekly changes are percentage movements from the previous Friday. Base date: Dec 1989=100 except those noted which are: (Y) Jan 1 1991; (C) Dec 31 1992; (B) Jan 5 1990; (A) Dec 31 1992; (S) Jan 3 1992; (E) Jan 4 1992; (M) Dec 31 1992; (P) Dec 31 1992; (I) Dec 31 1992; (N) Dec 31 1992; (O) Dec 31 1992; (L) Aug 4 1988; (H) June 2 1993.

The resounding victory of Turkey's prime minister, Mrs Tansu Ciller, in local elections 10 days ago appears to have re-established the Istanbul market on the upward track that it successfully took earlier in the year, writes Michael Morgan. The turnaround came at the end of five weeks of consolidation, which was marked by some political turbulence and rising interest rates. Over the previous three months, however, the market had surged by almost 120 per cent, encouraged by an improving economic and political outlook. Yesterday, the index rebounded as it approached the 55,000 mark, regarded as strong resistance. The index finished 1.4 per cent down at 52,344.73, but was still within striking distance of the all-time high of 54,653.93, set on April 21.

Mrs Nur Pekin at Schroders is optimistic about the outlook for the summer months, and has a target peak of 60,000 to 62,000 for the index. But later in the year, as the government looks ahead to elections in 1996, she says, it is likely to introduce an expansionary policy, widening the budget deficit; this, in turn, would put downward pressure on equity prices.

Miss Arzu Akkaya at Kleinwort Benson is upbeat, too. She notes that Mrs Ciller's victory in the local elections should ease the passage of important human rights legislation and the Customs Union agreement with the European Union. The victory would also enable the prime minister to claim that she had received a moral mandate to govern the country until next year. Together with a rapidly rebounding economy, surging exports and subsiding worries about the currency, she adds, this points to a summer rally in the equity markets which could take the index to the 65,000 level.

FT/S&P ACTUARIES WORLD INDICES

The FT/S&P Actuaries World Indices are owned by The Financial Times Ltd., Goldman, Sachs & Co. and Standard & Poor's. The indices are compiled by The Financial Times and Goldman Sachs in conjunction with the Institute of Actuaries and the Faculty of Actuaries. NatWest Securities Ltd. was a co-founder of the indices.

| NATIONAL AND REGIONAL MARKETS | | TUESDAY JUNE 13 1995 | | | | | | | | | | MONDAY JUNE 12 1995 | | | | | | | | | | DOLLAR INDEX | |
|--|--|----------------------|----------------|--------|-----------|----------|----------------------|--------------------|------------------|-----------------|----------------|---------------------|-----------|----------|----------------------|--------------|-------------|-------------------|--|--|--|--------------|--|
| Figures in parentheses show number of lines of stock | | US Dollar Index | Day's Change % | Point | Yen Index | DM Index | Local Currency Index | Local % chg on day | Gross Div. Yield | US Dollar Index | Day's Change % | Point | Yen Index | DM Index | Local Currency Index | 52 week High | 52 week Low | Year ago (approx) | | | | | |
| Australia (82) | | 163.16 | -0.2 | 151.69 | 86.79 | 118.12 | 150.86 | -0.3 | 4.16 | 163.61 | 151.86 | 86.97 | 119.26 | 151.39 | 160.82 | 157.95 | 173.93 | | | | | | |
| Austria (29) | | 192.26 | -0.7 | 178.78 | 102.28 | 140.38 | 140.20 | -0.6 | 1.28 | 193.61 | 179.80 | 102.97 | 141.21 | 141.03 | 198.89 | 167.48 | 182.64 | | | | | | |
| Belgium (29) | | 190.76 | 0.0 | 177.36 | 101.48 | 139.28 | 135.79 | 0.2 | 3.85 | 190.79 | 177.17 | 101.47 | 138.14 | 139.25 | 201.12 | 161.98 | 167.42 | | | | | | |
| Canada (102) | | 141.28 | 0.5 | 131.55 | 75.16 | 103.15 | 141.56 | 0.8 | 2.50 | 140.58 | 130.55 | 74.77 | 102.52 | 140.42 | 141.69 | 120.54 | 128.42 | | | | | | |
| Denmark (34) | | 279.86 | 0.4 | 260.19 | 148.88 | 204.33 | 208.73 | 0.5 | 1.52 | 278.76 | 258.88 | 148.28 | 203.31 | 207.80 | 287.44 | 238.61 | 258.81 | | | | | | |
| Finland (24) | | 216.56 | -1.1 | 201.37 | 115.22 | 155.14 | 155.74 | -1.1 | 1.58 | 216.01 | 203.39 | 116.48 | 150.74 | 157.80 | 218.01 | 153.68 | 156.75 | | | | | | |
| France (171) | | 182.93 | -0.4 | 170.99 | 97.47 | 133.78 | 142.11 | 0.6 | 1.15 | 182.50 | 169.49 | 97.07 | 133.11 | 141.28 | 191.17 | 167.79 | 163.54 | | | | | | |
| Germany (59) | | 156.63 | -0.3 | 145.62 | 83.32 | 114.3 | 114.3 | -0.2 | 2.07 | 157.07 | 145.87 | 83.54 | 114.56 | 115.58 | 157.98 | 132.08 | 135.83 | | | | | | |
| Hong Kong (55) | | 356.58 | -0.3 | 331.32 | 188.70 | 250.35 | 354.08 | -0.3 | 3.98 | 357.64 | 332.14 | 189.20 | 250.65 | 335.12 | 416.42 | 272.40 | 372.90 | | | | | | |
| Italy (102) | | 212.12 | -0.7 | 201.12 | 107.97 | 157.98 | 157.98 | -0.7 | 1.83 | 212.63 | 201.12 | 107.97 | 157.98 | 157.98 | 212.63 | 181.65 | 186.05 | | | | | | |
| Japan (58) | | 72.13 | -0.17 | 67.07 | 33.67 | 52.67 | 88.47 | 0.2 | 1.51 | 72.58 | 67.08 | 33.67 | 52.67 | 88.32 | 88.79 | 75.45 | 87.26 | | | | | | |
| Netherlands (48) | | 143.70 | -1.0 | 133.61 | 76.45 | 104.92 | 76.45 | -0.9 | 0.98 | 143.98 | 134.75 | 77.12 | 105.82 | 77.17 | 170.10 | 138.06 | 168.34 | | | | | | |
| Netherlands (48) | | 143.70 | -0.5 | 133.61 | 76.45 | 104.92 | 76.45 | -0.5 | 0.98 | 143.98 | 134.75 | 77.12 | 105.82 | 77.17 | 170.10 | 138.06 | 168.34 | | | | | | |
| Netherlands (48) | | 143.70 | -0.5 | 133.61 | 76.45 | 104.92 | 76.45 | -0.5 | 0.98 | 143.98 | 134.75 | 77.12 | 105.82 | 77.17 | 170.10 | 138.06 | 168.34 | | | | | | |
| Netherlands (48) | | 143.70 | -0.5 | 133.61 | 76.45 | 104.92 | 76.45 | -0.5 | 0.98 | 143.98 | 134.75 | 77.12 | 105.82 | 77.17 | 170.10 | 138.06 | 168.34 | | | | | | |
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| Netherlands (48) | | 143.70 | -0.5 | 133.61 | 76.45 | 104.92 | 76.45 | -0.5 | 0.98 | 143.98 | 134.75 | 77.12 | 105.82 | 77.17 | 170.10 | 138.06 | 168.34 | | | | | | |
| Netherlands (48) | | 143.70 | -0.5 | 133.61 | 76.45 | 104.92 | 76.45 | -0.5 | 0.98 | 143.98 | 134.75 | 77.12 | 105.82 | 77.17 | 170.10 | 138.06 | 168.34 | | | | | | |
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Thursday June 15 1995

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FINANCIAL TIMES SURVEY

TELECOMMUNICATIONS IN BUSINESS

Thursday June 15 1995

Telecommunications users are, and will continue to be, the chief beneficiaries of successive waves of liberalisation and privatisation which are reforming the global telecoms business. Prices are falling, new and attractive services are on offer and in the offing, and in many countries choice of operator is now a reality.

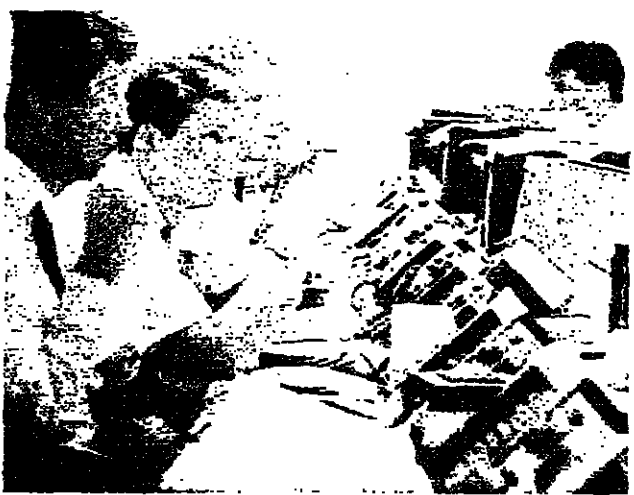
Business users are demanding better, cheaper and more flexible services from telecoms companies with some hope of having their wishes met - often for the first time.

Reform is likely to be steady rather than dramatic, however. In Europe it will be years before the bureaucratic and arrogant attitudes ingrained in many telecoms operators - through a deadly combination of state ownership and monopolistic service provision - are eliminated.

British Telecommunications, for example, privatised in the early 1990s, is only now emerging as an aggressive, world-class competitor. AT&T, the largest US long-distance carrier, is building alliances around the globe but still suffers from a certain insularity of attitude.

Analysts are agreed that customer attitudes are becoming the principal determining factor in the development of telecoms. It will be a testing new experience. Alan Cane reports

Customers have the advantage



Telecommunications and computing seem to be converging. BT Picture

This is the justification for the formation last year of the European Virtual Private Network Users' Association, a lobby of 40 of Europe's largest companies including big banks and leading manufacturers. They aim to force the large telecoms operators to listen to their requirements.

Mr John Sale, who works for EDS of the US, chairs the group. He says that pan-European companies had in the past found monopolist operators turning a deaf ear to their wishes. Now by acting in concert the group can demand lower prices and better services in advance of the January 1, 1998 deadline for the liberalisation of telecoms in most European economies.

At the same time, telecoms and computing seem to be converging, finally, to give real substance to the idea of an information technology revolution. There have been many false dawns over IT in the past three decades but the enormous interest in the Internet - a worldwide but primitive and anarchic computer network - suggests that the potential of linking high-speed communications to computer processing is now broadly appreciated.

Electronic mail on the Internet, for example, is beginning to replace facsimile as a business tool. The problem of introducing security to an essentially insecure network (the Internet pioneers wanted it to be easy to connect to) is being addressed. And a number of significant companies - including First Union Corporation in the US and Barclays Bank in the UK - are introducing shopping and payment services over the Internet designed to be proof against fraud. In France, it is now possible to access "Minitel" services over the Internet.

Interest in the Internet has been most marked in the US where there are some 1.3m "host" computers - that is computers with direct connections to the Internet and capable of providing services. According to the Internet Society there are now 270,000 hosts in the UK and 304,000 in Germany.

The growth of mobile phones continues to be dramatic as prices fall and the customer profile changes from principally large organisations to small and medium-sized businesses and, increasingly, people working from home.

The popularity of mobile telephony, however, is bringing its own problems. Cellular technology makes the best use of available wavelengths, but there is a limit to the number of subscribers who can be accommodated. GSM (Global

System for Mobile telephony) was introduced as a high quality service for business use. GSM is now standard across Europe and increasingly, the rest of the world.

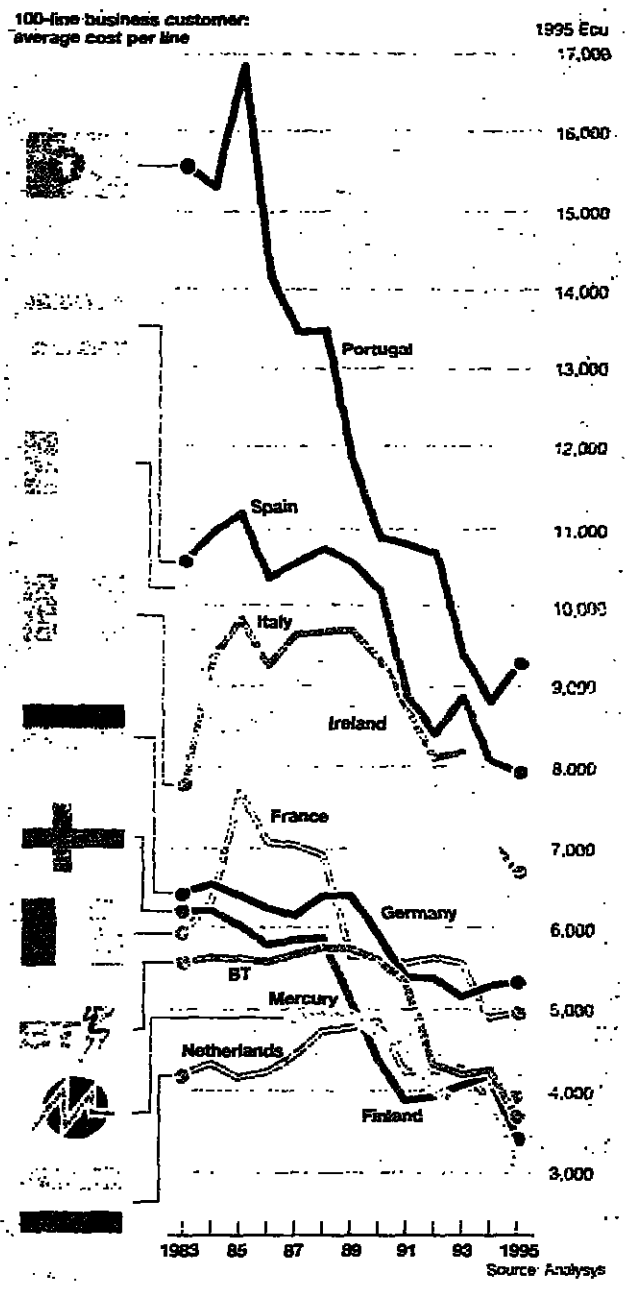
In some areas where mobile telephony proved an early success - Scandinavia, for example - the airwaves are already cluttered and operators are seeking to exploit new parts of the radio spectrum.

Mobile subscribers already represent about 17 per cent of the number of fixed lines and the proportion is growing rapidly. With the evolution of the world phone, a hand-held device able to switch automatically from cordless operation in the office to cellular operation in the city and to satellite transmission in remote areas, fixed lines may be increasingly for the information superhighway, the carrier for multimedia services.

Finally, business customers themselves are facing structural upheaval along with the prospect of new and intensifying competition: shortened product development cycles and time to market; and rapid technological change. They are competing in time and have to hone their telecoms activities to match the challenge.

Many have decided they no longer want the difficulties and problems of managing their own IT operations and have outsourced them to a third party. The largest telecoms operators have allied themselves into consortia to provide "managed network services" - essentially to run global networks on behalf of their large customers: British

Cost of telephone service



Telecommunications and MCI of the US through "Concert". AT&T and Unisource through "WorldPartners". Deutsche Telekom and France Telecom have an alliance called "Atlas". It has fallen foul of the regulators in

have to deal with a plethora of authorities and regulations.

Telecoms costs are low in countries where liberalisation has encouraged free competition, among them the US, the UK, Sweden and New Zealand. In anticipation of competition, prices have been falling across Europe. In some countries, however, telecoms charges still represent a substantial extra burden on business.

Analysis - a Cambridge, UK-based consultancy which specialises in telecommunications costs - estimates the total average cost per line in European Currency Units, for a 12-line business customer as Ecu2,456 for a customer of Deutsche Telekom, Ecu2,289 for a customer of France Telecom but only Ecu1,585 for a customer of Mercury Communications in the UK.

The key to the new services that customers are now enjoying and can anticipate for the future is the intelligence which resides in modern networks and switching systems. Telephone exchanges are today merely large computers: what they can accomplish is determined by the software which runs on them. Virtual private networks - which provide the services typically available only through a private network over the public switched system - and bandwidth-on-demand are two of new possibilities from intelligent networks.

Analysts are agreed that customer attitudes are becoming the principal determining factor in the development of telecoms: "In the future, there will be no loyalty in the customer base," says Andersen Consulting. "Until recently customers had to settle for what carriers offered at set prices. As their options open up, they will begin to treat telecoms service providers like any other supplier, demanding competitive prices and customised service to meet their needs. If customers do not get what they want they will switch."

It will be a testing new experience for customers to dictate their telecoms requirements: now that the confluence of circumstance has given them the advantage, it should not be relinquished lightly.

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Production Editor:
Philip Sanders

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TELECOMMUNICATIONS IN BUSINESS 2

Interview: Malcolm Wollaston of 3M on a big user's requirements

Global operators needed

It is the perfect demonstration of 3M's commitment to leading edge telecommunications. Malcolm Wollaston, the company's global telecommunications manager, welcomes you into his office and the meeting begins, suddenly his desktop computer imposes its presence on the discussion. Images of Mr Wollaston in his Bracknell, UK, office together with another neatly suited executive appear in separate windows on the screen as the loudspeaker crackles into life. It is a colleague calling from Brussels, courtesy of desk-top video.

The system, built around technology from the US company PictureTel, is set up for urgent communications. It interrupts whatever Mr Wollaston is doing just like a telephone call. "We have invested \$5m in this technology, partly to cut the cost of travel but principally to accelerate decision-making," Mr Wollaston says.

"A 3M production facility in Japan came to a standstill. We needed to consult with the specialists in our US laboratories and engineering facilities. We hooked up a videoconferencing system in four hours to link 22

experts and we had that production line rolling in 13 hours. The team would not have been half way over the Pacific by the time we had the problem solved."

Mr Wollaston, with almost 30 years' experience in 3M during which time he has been responsible for the group telecommunications operations in the UK, Europe and now worldwide, is accustomed to thinking globally.

3M, which makes everything from adhesives and fabrics to specialty chemicals, has operations in 61 countries, employs 86,000 people and markets 60,000 products. Turnover

really means.

"KDD of Japan, AT&T of the US, BT here in the UK: all of these companies would claim to be global operators but there are some remarkably large tracts of this earth where they do not appear."

His solution is to use AT&T as principal services supplier worldwide, but to use the principal national operator in each country where 3M is engaged in business. "We use AT&T where we are able to, and elsewhere we select the best of local breed," he says.

"In the case of AT&T we have made significant progress because, through negotiation,

every 10 working days and exchange all the information on 3M's telecoms activities worldwide. The result is, they know about all the hot issues we are seeking solutions for."

3M has a number of advantages in dealing with the big telecoms suppliers. It has considerable in-house telecoms expertise with its own laboratories and skilled technicians.

And it has financial clout, spending some £160m a year on its telecoms infrastructure. Such organisations have little difficulty in getting the operators to concede volume discounts of between 10 and 40 per cent.

But as Mr Wollaston points out, 3M is not in the telecoms business. "It is absolutely crucial to the development and success of our business, but it is not a core product. We have 2,000 suppliers of telecoms products worldwide and that is a significant management challenge. We would like to reduce that number substantially."

It is likely, therefore, that 3M will outsource its telecoms activities? Not as such: Mr Wollaston draws a clear distinction between "outsourcing" where a company hands over

we have persuaded it to appoint three global account managers - one for the Asia Pacific region, one for North America and one for Europe. The effect of that is that I can pick up the phone and talk to the account manager anywhere in the world.

"The three of them meet in an audio or video conference once

Data transmission represents only a fifth of the company's telecoms spend, but it is critical for business development

is \$15bn.

Mr Wollaston is rarely satisfied in his search for telecommunications suppliers who can meet the company's global aspirations. He points out: "There are a number of companies who describe themselves as global, but with all due humility, 3M could show these companies what being global



Wollaston: a perfect demonstration of 3M's commitment to leading edge telecommunications. Picture: Ashley Ashworth

principal aims for the immediate future.

First, he is seeking integrated services digital network (ISDN) services in areas such as Asia Pacific, South America and Africa where the infrastructure is patchy. ISDN is essential for effective videoconferencing.

Second, he is looking for more efficient data communications in the world's underdeveloped regions.

Data transmission represents

only a fifth of the company's telecoms spend, but it is critical

Mr Wollaston has four prin-

cal for business development.

Third, he hopes to open a virtual private network across Europe. This year, 3M, in conjunction with a number of other large suppliers, will begin to test a Europe-wide virtual private network provided by AT&T and BT.

Virtual private networks are made possible by intelligent switches and provide advanced features such as caller line identification and call-following over the public switched network.

Mr Wollaston is a board

member of the European Virtual Users Association: the group used its combined purchasing power to persuade AT&T and BT to co-operate to create the virtual network.

He has little time for the conventional national demonstration lines: "All the operators are trying to protect their own turf while I am looking for transparency and interoperability. I want them to work together behind the scenes to meet my business requirements. What you get is the old finger-pointing: 'That is not on my patch; not my responsibility,'" he says, with a touch of exasperation.

Fourth, he hopes to move conventional data communications to a faster, cheaper alternative called "frame relay" - a precursor to Asynchronous Transfer Mode (ATM) which many believe is the digital technology which will make possible the information superhighway.

Mr Wollaston, however, tells a story which speaks volumes about progress in telecoms.

"I remember that ISDN was the star of the trade show Telecom '79. The Italian telecoms authority said they would have ISDN lines through most of Italy by 1981. Now, 16 years later, we are still struggling to have ISDN in the Genoa region. If ATM takes as long to deliver, I shall be retired before we are using it."

Alan Cane

Interview: fast-growing new London operator Colt

Further price cuts forecast for the City

Mr Paul Chisholm has just changed jobs within Colt (City of London Telecommunications), a provider of telecoms services primarily to businesses in the City of London. Now in charge of a planned European expansion, he was formerly the supplier's managing director and is also involved in the Other Licensed Operators Group - an organisation of 20 public telephone operators which has focused its discussions with British Telecommunications and the industry watchdog OfTel on lowering barriers to market entry.

Although some businesses have been complaining that

pricing in the industry is too high, even though telecoms deregulation has been moving swiftly for some time, Mr Chisholm does not agree: "I guess I'd be taken aback a little bit if customers generally think prices are too high. People have probably unrealistic expectations of how much prices will fall with competition."

But he adds: "The benefits of competition have meant that prices have come down for most customers in the City and the main city regions of England. Switch calls, for example, have come down dramatically. Regional companies, such as Colt, Energis and

the cable companies have done that. International rates have also fallen. The traditional BT price to the US was something like 42p a minute. Mercury is about 38p. The going rate for companies in the City now is about 20p."

Mr Chisholm believes that businesses can look forward to further price-cutting activity and draws a parallel with the US: "Competition has been in place in the US for about 20 years. For 15 of those, prices came down. Only in the last few years have prices stabilised."

However, for companies outside the City of London, he is less hopeful. An organisation

based "where competition has not taken a foothold" - an example he gives is the east of England - might not be able to shop around for competitive telecoms rates.

He argues that competition has made BT cut its retail prices but the wholesale charges between BT and Colt are a bone of contention. Without OfTel, he says, "there's no reason for BT to move. In the wholesale market it has 96 per cent of the terminations [the destination of each call] in the UK. Customers complain that they want free local calls. We can't give them that because we have to pay BT for all those final connections."

So there is a need for a regulator: "BT is too strong but OfTel's performance in general has been tremendous." He points to the work that has been done on simplifying contracts and pricing agreements between telecoms operators. In particular he is pleased with the negotiations that have taken place on interconnection charges - the price paid when calls are passed from one operator's network to another.

"When the Other Licensed Operators started up there were no standard contracts or standard pricing in the industry. That's been resolved. Negotiating interconnection agreements was difficult,

time-consuming and expensive. But a new operator now has access to information, product, pricing and terms and conditions from which it can develop a business plan."

Mr Chisholm admits that there is still much more work to be done as regards competition and regulation. "There is no problem getting a licence but that does not mean there are no barriers to effective entry. There are many inherent benefits accrued to BT by virtue of its monopoly power. It is necessary to see the national network as a national asset open to all public telephone operators. These operators must become part of the



Chisholm believes businesses can look forward to further price cuts

process in order to improve services and bring choice to customers."

In Colt's view, slowness to change impedes the chances of business customers being serviced exactly to requirements. But there is still plenty of

room for smaller suppliers to specialise in particular services - as Colt's customers in more than 300 City of London buildings would probably testify.

Adrian Michaels



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TELECOMMUNICATIONS IN BUSINESS 3

Christopher Price looks at the impact on BT and Mercury of new UK operators

Drive for residential customers

The raft of price cuts announced recently by British Telecommunications is yet another sign of the UK's biggest telecoms group feeling an increasingly tightening pinch from other operators.

There are more than 100 licensed operators in the UK, but BT's move - lopping some £310m from customers' bills - is a mark of how seriously it considers the threat from new entrants into the market, particularly the cable companies.

They have been focusing their drive for new business chiefly on residential customers and BT's decisive response earlier this month was also aimed at that part of the tele-

phony market. However, the growing broads being made by both cable companies and other licensed operators into the business market is unlikely to go unnoticed, or unchecked.

Three of the most prominent challengers to the dominance of BT and Mercury, the first alternative telecoms operator to be licensed, include Colt, which operates in the City of London, Energis, owned by the National Grid, and MFS, the US telecoms group.

Colt was awarded its first telecoms licence - for use in the greater London area - two years ago, although it has limited itself largely to the UK capital's financial centre, the

City of London. It has laid about 110km of cable at a cost of £30m and services some 350 buildings in the City.

The group, which is owned by US investment house Fidelity, turns over about £10m a year. It has recently applied to the UK government for a national operators' licence, although it is also eyeing other city areas, such as Manchester, Birmingham and also the M4 corridor.

Colt has signed a preferred supplier agreement with Energis, each company using the other's area strengths - Colt in the City and Energis for its long-distance network.

Energis arrived just under a year ago, using National Grid's pylon to carry its 3,500km fibre optic network, with an initial investment of £250m. Its stated aim was to target small and medium-sized business customers.

Launched in March this year, MFS's fibre network covers most of the City and Docklands and is being built out to Southwark and Westminster. The company is considering a plan to extend the network to the Thames Valley, putting MFS within reach of 35 per cent of the UK's big telecoms users.

The big selling point of all the new telecoms operators is price. Colt, for example, claims to be 15-20 per cent cheaper than BT. The issue is inevitable, with BT at pains to point to the "hidden" costs carried by some operators. While admitting that its basic call costs are often higher than those of competitors, BT also likes to stress the experience, service and breadth of expertise the company has built up.

However, growing numbers of business users have been switching to the new operators, drawn by promises of cheaper rates, but also attracted by other considerations. For example, a move to Energis by life insurance group London and Manchester was technology-driven. The telecoms group was developing a call management information system in conjunction with a Toshiba telephone system used by L&M. The insurance group, which is headquartered in

Exeter but which has 40 field sites, was keen to garner more information about its telephone usage, which Energis was able to offer.

"The management information system we now have from Energis allows our local managers to be in control of their call costs and even monitors the quality of telephone service we give to our customers," said Mr John Willis, the group's telecoms manager.

He praised the attitude of Energis, particularly on its business emphasis. "Energis come from a different angle to deal with small and medium businesses. They seem to understand what our type of requirements are."

Price was also an important factor, admitted Mr Willis, although the company continued to keep its options open. "We also continue to use BT, Mercury, Energis and have just signed up with our local cable provider, Eurobell." He said that the group's suppliers would be reviewed periodically and the group would choose its provider on price and service.

"The more suppliers, the stronger our position on price."

A similar system exists at Reuters, which uses the big two, along with Colt. The US-owned group was used initially on a project to provide a Synchronised Digital Hierarchy service - essentially a line back-up service - to the news and information group last year. Since then, Reuters has used the telecoms provider more extensively.

"They proved themselves in terms of price and service. They listened to what we wanted and went away and delivered," said Mr Kirk Langley, a marketing manager at Reuters.

Mr Langley said there was a perceived loyalty to the group's traditional telecoms suppliers. However, the situation was "application specific... if a new player comes on board we are very happy to try them out."

Similar criteria were sought by Mr Richard Lander, manager of multimedia services at Telerate, the financial information group. It has recently launched a screen-based infor-

mation system to dealers in the City of London. It began its search for a telecoms provider last October.

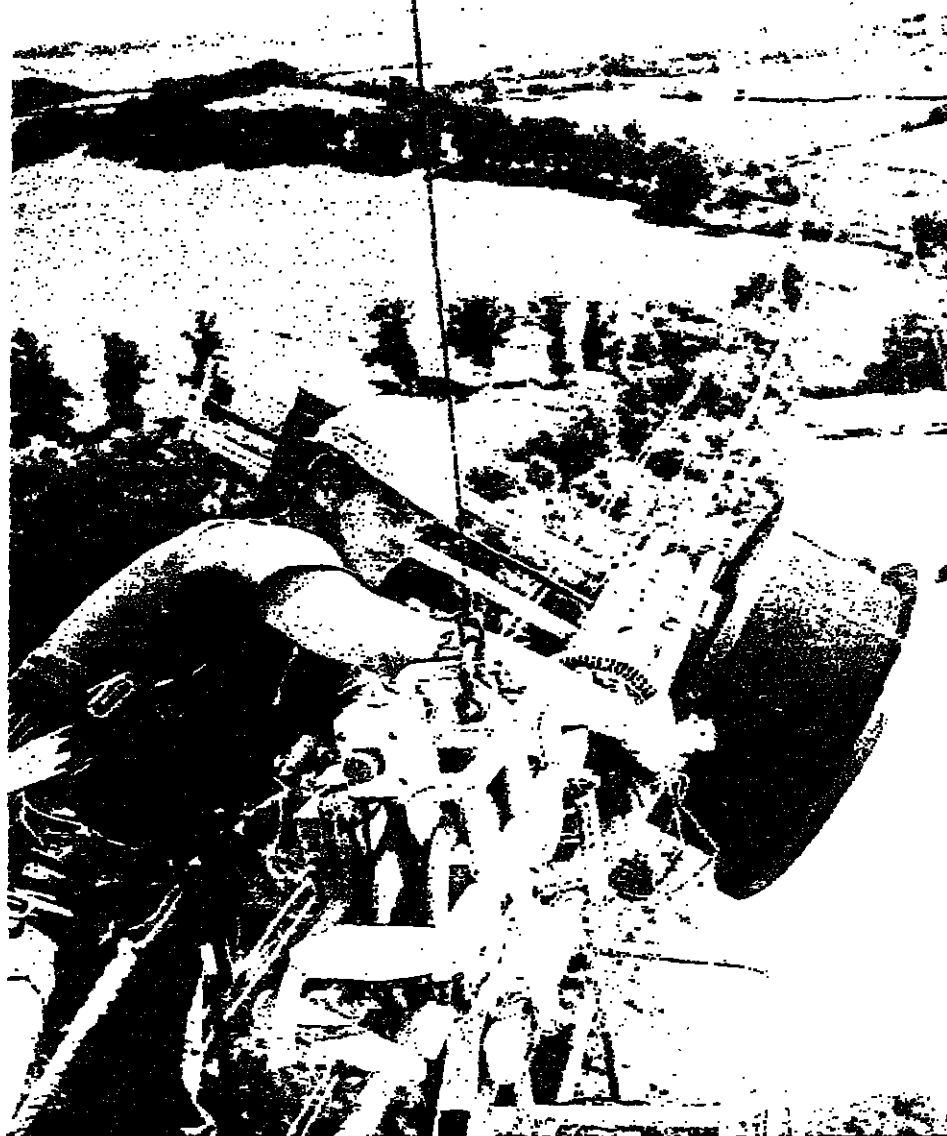
"We needed a supplier who was flexible, responsive to our needs, had a good effective business plan and was also price-effective for our requirements," said Mr Lander.

After sourcing all the main providers, Telerate chose MFS. "They were the most hungry for the business; their whole attitude was better," said Mr Lander.

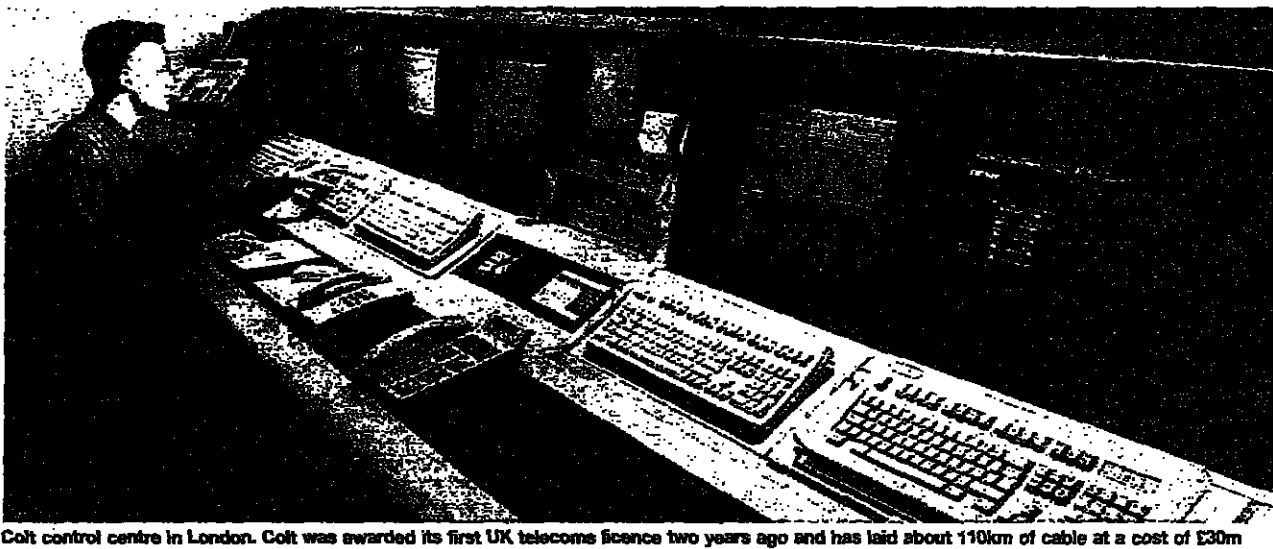
The difference in price between the different operators was "significant" according to Mr Lander, with Colt and MFS "well ahead" of BT and Mercury. "We knew what price we were charging for our service and so had to find a cost that we could manage for our supply."

"The development of competition among the telecoms operators had put companies in the driving seat, according to Mr Lander. He has no fears about being tied into one operator. "If an operator offering competitive rates decided to hike up their prices, customers would just vote with their feet, it's as simple as that."

BT said that their "vigorous" response to the arrival of new entrants had resulted in the group winning back market share in the City, up from 50 per cent in 1993 to 70 per cent in the first quarter this year.



Energis is installing a 3,500km fibre-optic network along the earth cable of the UK electricity industry's pylons



Colt control centre in London. Colt was awarded its first UK telecoms licence two years ago and has laid about 110km of cable at a cost of £30m



Challenger: the Colt (City of London Telecommunications) network

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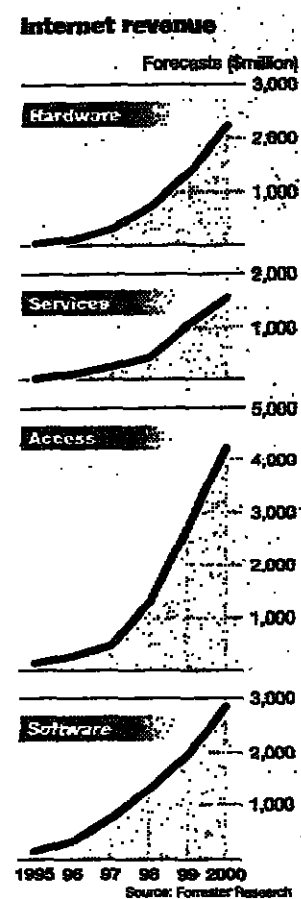
Now we've raised the standards in London, it's Europe's turn.

What's Today's Offer?

TELECOMMUNICATIONS IN BUSINESS 4

The Internet has now reached critical mass, reports Paul Taylor

Revenues of \$10bn forecast



security concerns, however this is now changing.

In Silicon Valley, for example, a consortium of high-tech companies is creating CommerceNet, an Internet marketplace for electronics products.

Using a secure browser program, customers can order products directly over the network using their credit cards.

Using the latest version of Netscape's WWW browser, secure shopping malls have been set up by US-based companies.

These include marketplaces like the Internet Shopping Network and Access Market. Using the latest version of Netscape's WWW browser, secure shopping malls have been set up by US-based companies.

Meanwhile Barclays Merchant Services launched BarclaySquare, an electronic shopping mall, last month.

BarclaySquare uses the encryption features of Netscape Navigator v1.1 coupled with proprietary security features developed by Interactive Telephony, a private Jersey-based company which operates SuperNet, an embryonic on-line information service.

However not everyone agrees about the potential of the Internet for electronic shopping.

According to a recent Dataquest survey, fewer than 25 per cent of Internet users are willing to make an on-line credit card purchase.

Although the Dataquest survey confirmed that security was a primary concern - more than 60 per cent of the survey respondents considered security to be very important - security is only a small part of the lack of interest in on-line shopping today.

The key factors behind the growth of electronic shopping are developing compelling applications and producing scenarios that focus on the consumer rather than the merchant, said Allen Weiner, a principal analyst with Dataquest.

Applications need to provide convenience as well as a pleasurable shopping experience to be successful with the consumer, simply providing a different way of doing the same old thing will not lead to success in this market.

The growth of the Internet is also fueling the development of a dynamic hardware, software and services industry to support the Internet itself.

Input, the market research firm, estimates that the Internet will drive the development of a software, support and services market in Europe alone worth \$35bn in annual revenues by the end of the decade.

The Internet phenomenon is the biggest information services story of the 1990s, says Mr Peter Cunningham, Input's president and founder.

In the US, for example, Sun Microsystems, the leading supplier of computers linked to the Internet, is also itself a heavy user of Internet applications.

The computer company is using the WWW to reduce costs of employee and customer training, printing, software distribution and customer service. Sun claims to save about \$1m each quarter by distributing software patches and pre-release versions of new programs on the WWW.

Nevertheless for all its advantages, the Internet has a number of drawbacks. In particular it lacks a comprehensive directory of users and services and has suffered from a number of highly-publicised security breaches.

The scramble among businesses not to be left behind by the Internet revolution has meant that the normally high security standards found among large information technology users are not mirrored in their policies towards Internet links, says Mr Brian Neale, Digital Equipment's leading authority on Internet security.

He said: "We estimate that three-quarters of large firms currently using or intending to commit to the Internet are in this position. The promise of substantial benefits from the commercial application of the Internet has turned many companies into dangerous drivers on the information superhighway. This leaves them exposed to unnecessary risks."

Speaking in December at a UK forum on security and the Internet, delegates were told "security practices which are required for an internal network with a few thousand users simply do not guarantee secure links to an Internet community of 35m people," by Mr Gerry O'Neill of the National Computing Centre.

To combat the security problem, companies linking their computers to the Internet have built "firewalls" to protect sensitive internal information against intruders.

Business users can also look forward to improved services as new software and encryption technologies continue to transform the global computer network into a robust business tool.

References: *Sizing the Internet*, Forrester Research, (44) 01753 81534; by subscription only. *Internet Users: Who They Are, What They Want*, Dataquest, (44) 01494 42722; price \$1,895. *Business Applications of the New Internet*, SRI International, price: \$1,000; (44) 0181 686 5555

Big company networks: Mark Newman on global operator alliances

Caution over outsourcing

Are large businesses ready to hand over control of their telecommunications networks to public network operators? It is a question that has been consuming the minds of the international telecoms community since the first shots were fired in the global-telephone-operator-alliance wars four years ago.

Outsourcing provided the first step into the international networks market for BT in 1991. It was BT's aborted attempt to set up a joint venture with Deutsche Bundespost Telekom and Nii of Japan which triggered off a scramble among European and US telephone companies to set up global partnerships.

But have users really benefited from the growing attention that they are supposedly receiving from telephone companies? And are the operators managing to convince them that telecoms is not a core business, and that they should move into the passenger seat while a specialist telephone company takes over at the wheel?

A reasonable answer would probably be no, not yet. A large number of multinational corporations are outsourcing parts of their networks. But very few are outsourcing their entire networks.

Users are enthusiastic about the concept of outsourcing, but cautious to commit themselves. There are a number of reasons why.

There is continued uncertainty over the long-term stability of global alliances and partnerships. The alliance between France Telecom, Deutsche Bundespost Telekom and Sprint, a US telephone company, is still awaiting clearance from both Brussels and Washington. Unless Germany, and particularly France, move quickly to open their domestic

markets, it is difficult to see how it will win US approval. Without regulatory clearance, what future can there be for such an alliance?

There are similar doubts concerning the alliance between AT&T and Unisource, the group owned by ITT Telecom Netherlands, Telia of Sweden, Swiss PTT Telecom and Spain's Telefonos.

This uncertainty makes telecom managers nervous about committing themselves to single-supplier relationships.

Concert, the BT-MCI joint venture company is the most stable of the alliances. It is the

handful of access points in a single country.

Users also face a dilemma in deciding between short contracts of one to two years, or longer, five-year contracts. The introduction of new technology and the advent of competition is driving down the price of international telecommunications services. What looks like a fair price today may be over the odds in two to three years' time.

On the other hand, suppliers are reluctant to offer short contracts. In many cases, they can only justify the cost of building a network to meet the needs of

member will be the lead contact? It could be Unisource, AT&T or Unisource, the joint-venture company.

Can global alliances provide the full range of services that large companies need? Until barriers to competition are lifted, probably not.

Global service providers can only provide public switched telephone services in a handful of countries outside their home markets. The European market will not be liberalised until 1998, although member states are increasingly allowing competitors to offer switched public voice services to closed user groups. But such services can only be delivered over the networks of the incumbent operators. Competing carriers lack local infrastructure and have little control over the "last mile" to the customer.

Are the services offered by outsourcers reliable? And can they really provide the advanced new services that they promise?

Multinational corporations have thought long and hard about the advantages and disadvantages of outsourcing. They are rapidly coming to the conclusion that there are benefits to be had from outsourcing parts of their networks. Four out of the five companies interviewed in a survey this year by Communications Week International, the telecoms industry newspaper, said they outsourced at least part of their networks. Another study by the International Telecommunications Users Group indicated that outsourcing has gone further than is commonly supposed.

But international outsourcing still has much to do to prove its capabilities, and outsourcers are only beginning to come to terms with how difficult it is to separate telecoms managers from their networks.

Who takes the lead? If a large user signs up with AT&T-Unisource, which alliance

Do companies risk losing their competitive advantage by handing over control of their networks? "People are concerned about giving away their competitive edge," said the telecoms manufacturer of a leading pharmaceuticals company.

They feel that outsourcing companies have not made enough effort to understand their business," he added. Outsourcers were "gradually" making progress in this respect, he added, but progress was slow.

Does outsourcing necessarily offer lower costs? A number of large users have found hidden costs associated with managing an outsource. For example, users have to install private circuits to their different sites to suppliers' global backbone networks.

Outsourcers may only have a particular customer on the basis that they will be guaranteed several years of revenues. It can also be expensive for the user to switch outsourcers after only two to three years.

Are global carriers global? In most cases, no. The three key alliances - Concert, Unisource and AT&T, and the alliance of France Telecom, Deutsche Telekom and Sprint - all have a bias towards the US and Europe. Can you really expect multinationals with operations in Asia to hand over control of their networks in the region to a US or European-based venture?

Chase Manhattan, the US bank, is working with a separate supplier in each part of the world because it is not convinced that global alliances can co-operate properly. Its supplier in Asia is Hongkong Telecom, the Cable & Wireless subsidiary, which hubs traffic from its various subsidiaries in the region.

Who takes the lead? If a large user signs up with AT&T-Unisource, which alliance

The emphasis is firmly fixed on partnership. "Five years ago we offered BT our network and they refused. They have changed since then and probably could do it now but often talks with large telecoms companies founder when our precise requirements are fully understood. We are going to have to work fully together with whoever our partners are. Eight years ago, no one else

rightening and we will simply not be able to build the network we are going to need."

Barclays is looking for a partner. "The need to stop managing the network is not about costs, it's about survival of the business," says Mr Bellamy. "We need to break out of the arrogance that we can do everything ourselves. If not,

could have set up and run the network for us. Now there is no competitive advantage in running it all ourselves."

He acknowledges, however, that Barclays is a unique case. There are many smaller companies who feel they do gain advantages from managing their own networks.

At Virgin Atlantic, Mr Simon Keen, systems and network planning manager, is part of a small team which looks after separate voice and data networks.

The voice network connects

Two full-time engineers solve day-to-day problems and adjust the system to facilitate staff movements

people are going to be sorely disappointed.

It's a morale issue as technology becomes obsolete. We have many people employed in the telecoms area of the company and they see their skills going out of date. We would need a full technology infrastructure in the company to deal with that."

There are other reasons why Mr Bellamy believes the time is right to hand over the operation. "Three years ago, I listened to someone relate with pride that we had as many as



Bellamy: hard-headed statement rooted in business sense

Case study: Barclays Network Services

Beware the Tower of Babel

As network director for Barclays Network Services, Mr Keith Bellamy oversees one of the largest private data networks in the country.

The network, running on lines mostly leased from British Telecom, has been established for eight years and has had at least two large revisions in that time. It connects all Barclays branches and supports all the bank's UK transactions - some 4bn last year. And it is growing very fast.

Data traffic carried on the network grew 60 per cent in 1993-94 and Mr Bellamy expects traffic to double this year. The number of terminals has risen from 30,000 about 18 months ago to 80,000 now. Meanwhile the system has at least one new piece of software added to it every week.

Says Mr Bellamy: "We've got one of every network you could come across. The reality is that networking came from the dungeon of the ivory tower. In the late 20th century we made the same mistakes as the Tower of Babel - almost literally when you consider we have over a dozen message systems."

He estimates the system will need \$6bn-£7bn spent on it over the next few years. "As technology changes we are getting diminishing returns from investment. We are not a telecoms company even though we have to act like one. And even though I am far from convinced that any external providers can deliver the service we need, we should not be running our network."

This is a hard-headed statement rooted in business sense, according to Mr Bellamy. "My gut feeling, which is not based on much research as yet, is that the costs are going to be



Bellamy: hard-headed statement rooted in business sense

365 suppliers. On the data network side, we've now got that down to less than 80 but we are having to look very hard at the question of managing suppliers. Too often we don't talk a common language with them."

But things are improving. He cites an exercise undertaken by Hewlett Packard and BZW where the two joined forces to identify needs. Mr Bellamy says that other suppliers, such as International Business Machines, are signing more comprehensive partnership supply agreements.

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The voice network connects

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Database is the main

Case study

CTI at Domestic

Database has

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Help Line can help

Philip Quotient, how

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phone calls are

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the company's Domestic

London, writes Claire

voice

The business since 1912, D&G

has been a specialist

in domestic appliances,

claiming more than 2.6m

customers. Its CTI system

has enabled D&G to

reduce its 70 staff to

just a few years ago it

had 12 staff to take 4,000

a customer whose

request goes wrong, the

customer service, seven days a

week, covering everything to

gas and heating.

D&G's Automatic Call

Claire Gooding examines Computer Telephony Integration

A two-way long-term relationship

The computer and the telephone can be tied together in various ways - the casual dalliance via modem; the distant, more frustrating encounter with a voice-messaging system that invites the caller to use the touch-tone keypad to divert elsewhere.

Computer Telephony Integration (CTI) is often described as a "true marriage" between computing and telecommunications. It is certainly a two-way long-term relationship, driven by the realisation that the telephone, not the home computer or the television, is the most universal, well-understood and easily available way of delivering information.

"Increasingly in the UK and Europe, people are much more prepared, and indeed willing to do business over the telephone rather than writing to their insurance company or queuing to do business in the bank," says Stuart Bowden, business development director at CTI systems specialist Envoy, and chairman of Actius, the Association of Computer Telephony Integration Users and Suppliers.

"Because of this, companies are having to ensure that the service they give is of the highest quality."

Mr Bowden cites British Air-



Bowden: 'People are much more prepared to do business over the phone'

operator with information that will help the operator to respond appropriately. Once the caller has given his or her name and other information (often the postcode), the agent can bring up the relevant information from the computer, a process known as "screen popping".

The database is the main difference between CTI and the older call-routing ACD (Automatic Call Distribution) systems, in use for 30 or more years by organisations to manage high volumes of incoming calls. The most sophisticated CTI systems not only route the calls, but like BA's Rapport, use Calling Line Identification to "read" the incoming call and deliver both call and the appropriate database record to the screen without human intervention.

Whether the screen record is delivered automatically or is summoned by the operator, it is the preamble to an exchange in which the caller volunteers or requests information from a live operator or "agent", whose job is to interpret and relay verbally what he or she sees on the screen.

Interactive Voice Response cuts out the human, and allows the caller to talk directly to the database. IVR is often PC-based or connected and is most commonly used to deliver or accept information without human intervention, such as placing an order or delivering account-balance information.

Both voice and touch-tone input are supported by voice systems integrators such as US-owned SynTellect, UK company Vocalis, based in Cambridge, and AxSys (owned by the National Bank of Kuwait, NBK, and based in Jersey with a research arm in the Philippines).

Financial institutions are enthusiastic about the cost-efficiency of IVR. TSB's Speedlink offered an IVR system in the 1980s; now its TSB Phonebank uses CTI and IVR techniques from Envoy Systems of Richmond, mixing the two so that customers get the best of both worlds. NBK does the same with its Watani (national) Phone Bank, similar to Midland's First Direct telephone banking service in the UK, and

of ATMs (Automatic Teller Machines). Users call a single number, and are switched through to the appropriate telephone banking service.

The service cuts the cost of delivery. "If you can take the transaction out of the branch and put it on an ATM, you cut the cost of that transaction by 90 per cent," says Richard Stutely, director and executive vice-president of AxSys.

"If again you take it off the ATM and put it onto a telephone banking system, it is generally agreed in the banking industry that you cut the costs again by a further 90 per cent."

Other innovative users include Skandia Bank, a SynTellect customer which has a single high-street branch in Stockholm, but offers instead a free IVR service. Its low costs and fixed charges for ATM and other transactions enable it to offer an interest rate 4 per cent above points higher than rival savings accounts, and this has proved an incentive for customers to manage their money interactively on a daily basis.

Another SynTellect customer, South West Electricity, has saved hours of frustration and massive administrative costs by allowing users to enter their own meter readings into an

IVR system. "The technology is not new," says Mr Bowden, "but there's also a better understanding of how to build a business case for the investment, with quantifiable business benefits. Companies are now looking for more sophisticated ways to use CTI to differentiate themselves in the marketplace."

He believes the UK is far ahead of most of Europe in implementing CTI and more or less on a par with the US in terms of market penetration per head of population.

"Germany is just waking up to the potential, and it's now taking off across Europe in Spain, Germany, and Scandinavia. The very fact that Novell and Microsoft have started to take an interest has also helped the market."

The Asia Pacific markets also provide about 20 per cent turnover for Octel, which claims to be the largest supplier in the world of voice-messaging systems, with 35 per cent of the voice-processing market, ahead of AT&T. Northern Telecom and Rolm. Octel supplies voice-messaging systems to Microsoft, the world's largest software house, and is working on an integrated voice-messaging and e-mail system to run under



British Airways recently won the Actius Integrated Call Centre Award

Picture: Tony Andrews

Microsoft's Exchange client-server e-mail systems.

Octel took over the strategic alliance that its competitor VMX had already established with Microsoft when it acquired VMX in January 1994. Development work in Octel's client-server development section, based in London, started in October 1993, with Microsoft engineers.

"We are shortly launching our voice-messaging and e-mail integration system, code-named Geneva," says Henry Hyde-Thomson, worldwide

director of technology and strategy for Octel Communications. "Messages can be delivered from PC to PC without going through the voice system. It also means that users can access messages through the telephone or PC, wherever they are, read e-mail, and be notified of faxes and down-load them."

"What we've worked on is the integration of voice-mail with e-mail," says Mr Hyde-Thomson. "The telephone handset is the point of delivery. What's new for us is that

we're now integrating with the world's largest software house, Microsoft, on its Exchange client-server e-mail system. Our customers will be able to use the new Geneva technology as an add-on component to existing systems."

References:
Actius - Tel 01372 361000 - also publishes an excellent guide to CTI terminology; contact Roy Bailey.
Ovum: Computer Telephony Integration: the business opportunity published January 1995. Tel: 071 255 2670

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Case study:

CTI at Domestic and General

Database has created a valuable opportunity

"Sony Help Line, can I help you?" "Philips Quoteline, how can I be of service?"

In fact, the room full of people giving these diverse answers to telephone calls are working for a different company altogether: the insurance company Domestic and General, in Wimbledon, south London, writes Claire Gooding.

D&G is using Computer Telephony Integration - a powerful combination of telephony and a computer database. This allows its operators to service insurance policies for more than three dozen different manufacturers, some to extremely tight service level agreements. The database has enabled D&G to create flexible products, such as the Multi-Appliance Monthly Policy, which covers a range of appliances from different suppliers on one policy.

In business since 1912, D&G has carved itself a specialist niche in the insurance and care of domestic appliances, dealing with 40,000 claims monthly for more than 2.6m policy-holders. Its CTI system has enabled its 70 staff to handle the 96,000 calls a month; only a few years ago it needed 12 staff to take 4,000 calls a month.

For a customer whose equipment goes wrong, the switchboard at D&G operates a 12-hour service, seven days a week, covering everything from video players to gas central heating.

D&G's Automatic Call

Distribution (ACD) system from Rockwell. Computer Telecommunications allows staff to identify which helpline the customer has dialled, so that they can respond to policy-holders with the appropriate manufacturer's name.

The CTI element of the system brings up a database record of the customer, so that any operator can instantly see the entire history of previous service calls. The system provides the number of a local repair agent and takes care of all the payments.

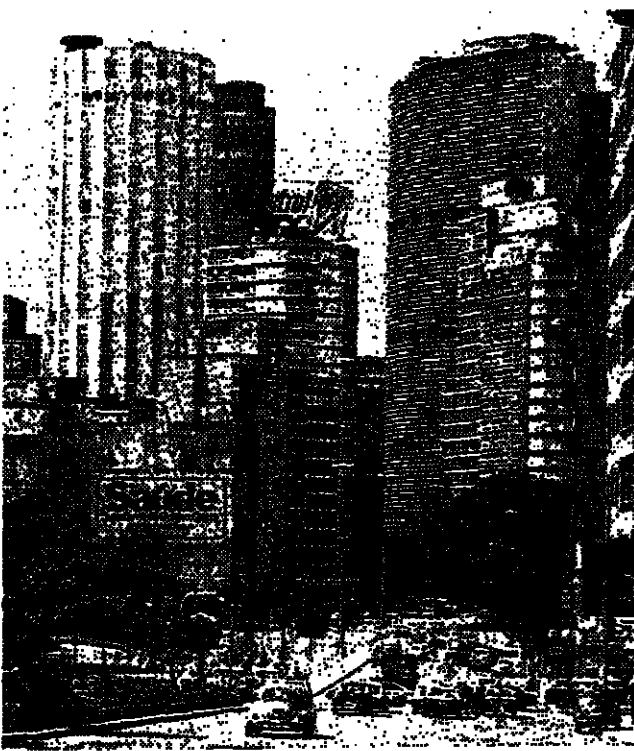
The CTI database has created a powerful and valuable opportunity for D&G to use its system for marketing and other purposes. It has recently launched First Domestic - a central heating insurance contract backed up by a 24-hour repair service. Another bright idea was to use the database and CTI techniques for product recall campaigns, where appliances have to be recalled because of specific faults. There are four such campaigns under its belt, (including a high-profile recall of a child's car safety seat), and D&G plans to expand this new business service.

D&G is typical in discovering that CTI is not just a low-cost and efficient way dealing with calls: it is a technology that creates business opportunities. CTI applications tend to be geared towards giving real service, unlike voice-messaging systems, which callers often find frustrating to use.

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of Babel

TELECOMMUNICATIONS IN BUSINESS 6



São Paulo: cellular phones were only introduced in 1993

International perspectives:

Brazil

Business users rue the day

By Angus Foster
in São Paulo

Ask a business user in Brazil about the country's telecommunications services, and the reply is likely to begin with a well-chosen swear word.

There are two main complaints. Business rates are extremely expensive, thanks to cross-subsidies for residential users. And services are extremely limited because the government and its telecommunications monopoly Telebrás have lacked the finance to invest or the competition to lift performance.

The result is that although Brazil has the world's 11th-largest telecommunications network as measured by terminals, much of the system and services available have hardly been modernised since they were installed in the past two decades.

Underinvestment by Telebrás since the early 1980s, mainly due to Brazil's overall economic crisis, has left the country with only about seven terminals for every 100 inhabitants, one of the lowest figures in Latin America. Call failure rates are up to five times higher than in Europe or the US.

The waiting list for a new phone in São Paulo, the most important industrial state, is two years.

Business users face special problems. Most exchanges are still pulse rather than tone, limiting the business uses of telephones and leaving executives distraught when they encounter tone-operated voice-response units (VRUs) overseas. Only a third of exchanges are digitalised and fibre optic cables are only now being laid on long-distance routes, leaving much of the system with poor-quality lines.

Those business services which are available, mainly provided by Embratel, Telebrás' long-distance arm, are limited to basics such as packet switching and dedicated lines. A wide range of services, from advanced data transmission such as frame relay to simple conference calls, are not available. One company uses its US head office to set up conference calls in Brazil. Although far from ideal, the mechanism is also cheaper since calling from Brazil to the US costs \$1.80 a minute, more than twice the cost of a US-Brazil connection.

Modernising Brazil's telecommunications will take time, but a start does finally appear to have been made. Congress last month started discussing an amendment to the constitution which would break Telebrás' monopoly and allow private sector competition in telecommunications. The proposal, which needs approval in four separate votes, has so far been well received and could become law later this month.

"It's a good sign and shows we are on the right track. But many of the details are still to be resolved," says Mr Carlos de Paiva Lopes, chairman of equipment supplier Ericsson in Brazil.

Mr Sérgio Motta, communications minister, believes that the state alone does not have the resources to invest the \$30bn-\$35bn which will be needed to upgrade Brazil's telecommunications until the end of the century. With plans to nearly double the number of installed terminals to 23m by 1999, the private sector will increasingly be needed to invest in areas such as cellular networks.

Even low-orbit satellite com-

munications systems are being studied.

He foresees a three-step restructuring of the sector to increase competition if the amendment is passed. The first, which he believes could take effect almost immediately, would open higher value-added telecommunications services such as cellular networks and data transmission to private competition.

Second, a new regulatory and pricing structure needs to be set up, probably by absorbing those parts of Telebrás and the communications ministry which have regulatory functions. Finally, Telebrás' operating arms in the 27 states would be merged into six to eight larger companies in preparation for competition in basic telephony and eventual sale to the private sector.

With so much to do, and with the legal and regulatory framework still lacking, progress could be slow. "Considering the size and complexity of Brazil and the market, it is better to get the regulations right rather than rush them," says Mr Francisco Loureiro, general manager of the Brazil office of US carrier Sprint. Opening

One complicating factor which needs to be resolved is the pricing regime

higher value-added services to private competition would be a significant first step, especially because cellular

phones serve as a symbol for much of what is wrong with the state monopoly. Cellular phones were only introduced in São Paulo in 1993 and there are now between 1m and 2m people on waiting lists for terminals in Brazil. The rush for lines, partly fanned by the waiting list for conventional telephones, has already congested Band A frequencies in São Paulo while Band B remains off-limits to private competition until the constitution is amended.

Mr de Paiva Lopes of Ericsson estimates that the market for cellular telephones could reach 5m terminals, suggesting Brazil could be one of the fastest-growing world markets and extremely attractive to private investment. Value-added services such as data transmission would also be interesting for companies such as Sprint. "What is available in Brazil today is extremely restricted," says Mr Loureiro.

One complicating factor which needs to be resolved before the private sector will invest to start providing these services is the pricing regime. This has been used to subsidise residential users, especially in less developed regions, to the disadvantage of businesses and overseas callers. Telephone charges have also frequently been kept down by governments looking for politically harmless measures against inflation.

The monthly standing charge for a residential user is \$0.70 while a one-minute local call costs about \$0.02. Embratel's international rates, among the highest in the world's major economies, have been subverted by an increasing number of call-back services on offer from mainly US companies. But structural changes to the pricing regime remain unlikely in the short term because they would add to officially measured inflation, the government's number one enemy since a new currency was launched last year.

Given these problems, and the likely delays working out a new legal structure, business users are likely to be swearing for some time yet before the potential of Brazil's telecommunications market comes into view.

By Michio Nakamoto
in Tokyo

Last month, NTT, Japan's domestic telecommunications carrier, encountered the wrath of one of its customers in the form of a petition filed to the country's competition authorities.

Bloomberg, the business news agency, complained to the Fair Trade Commission that NTT's decision to raise the price of using local digital leased phone lines by as much as 63 per cent, while at the same time significantly reducing the price of long-distance lines, constituted an unfair competitive practice.

The company also criticised NTT's decision to raise digital line prices while maintaining the prices of analogue lines, which are used by an NTT subsidiary and a competitor to Bloomberg in providing information and systems to the investment community.

The price of digital phone lines in most parts of the world was cheaper than in Japan, which was the only country where prices were going up rather than down, the company said. How could NTT "claim to be at the forefront of the multimedia industry and at the same time almost double the price of digital phone lines?" Bloomberg asked.

The complaint by Bloomberg sums up the view of many business and individual users of telecommunications services in Japan. To many users, Japanese telecom services are both

too expensive and slow to come to market.

According to Bloomberg, a local 64-kilobyte digital phone line leased from NTT and covering an area within 15km, costs ¥42,000 a month, or almost four times a similar line leased from Metropolitan Fiber Systems in New York, which costs \$140 - or ¥11,900 at current exchange rates of ¥85 to the dollar. NTT's plan to increase the price would widen the gap even further.

NTT points out that its decision to raise some local digital line prices and reduce long-distance prices stems from a need to rebalance its rates in order to ensure that its loss-making local operations become profitable. The new local leased line rates better reflect the actual cost of providing the service.

However, the argument serves to raise questions about NTT's cost structure. Bloomberg is not the only company that points out the high cost of NTT's leased lines. Air Touch International, a US information agency, has also complained about NTT's plan to increase prices.

The rates for domestic leased lines covering 100km to 300km and at speeds of 1.5-2 megabits a second cost twice the

International perspectives: Japan

High rates and slow progress

international average and eight to 10 times more than the standard rates in the US, according to a report by Morgan Stanley in Tokyo.

Meanwhile, NTT raised its basic rate charge to all phone users in February this year, pushing it to about twice the basic rate charged in the US, the UK and France.

If the cost to NTT of providing its services calls for rates that are much higher than the

those charged by AT&T while those between Japan and the UK are 54 per cent higher than the rates charged by BT, according to a study by the Management and Co-ordination Agency. The study compared the cost of making a three-minute phone call during afternoon hours on weekdays.

While overall Japanese prices are in general much higher than those in other industrialised countries, much

NTT and KDD have both been carrying out extensive cost-cutting measures

international average, it is reasonable to assume that the level of NTT's own costs are partly to blame.

At the same time, KDD, Japan's leading international telecoms carrier, maintains international call rates that are significantly higher than those seen in other leading economies.

In spite of fierce competition with the new common carriers in the international call market, and an equally intense marketing campaign by the

company which draws attention to its lower prices, KDD's rates between Japan and the US are 11 per cent higher than

of the blame for NTT and KDD's high costs lies in their own lack of efforts to rationalise their operations, the Agency points out in a report published early this month.

NTT and KDD have both been carrying out extensive cost-cutting measures. But the Management and Co-ordination Agency notes that the proportion of personnel costs over total costs is the highest at NTT, at 38 per cent, followed by KDD, at 25 per cent.

"NTT needs to voluntarily formulate a rationalisation programme," the Agency states, while KDD also needs to cut employees further it says.

The problem with telecommunications services in Japan is not limited to high rates. The slow pace at which new services have become available in Japan belies the fact that the country has one of the most deregulated telecommunications markets in the world, apart from the US and the UK.

Virtual private networks were introduced in the US in 1985 but not until last year in Japan. Frame relay services, which provide high-speed data transmission at low cost, have been available in the US since 1991 but were only introduced in 1993 in Japan.

A service which enables users to identify the telephone number of the caller is only now being introduced in Japan although it has been available in the US for five years. Similar delays can be seen in a wide range of services.

The Management and Co-ordination Agency further criticises NTT for being slow to introduce a wide variety of discount services and notes that some regional NTT offices have not been willing to carry out connection work on weekends and national holidays.

Most people agree that the fundamental cause of the high cost structure among Japan's leading telecoms carriers and

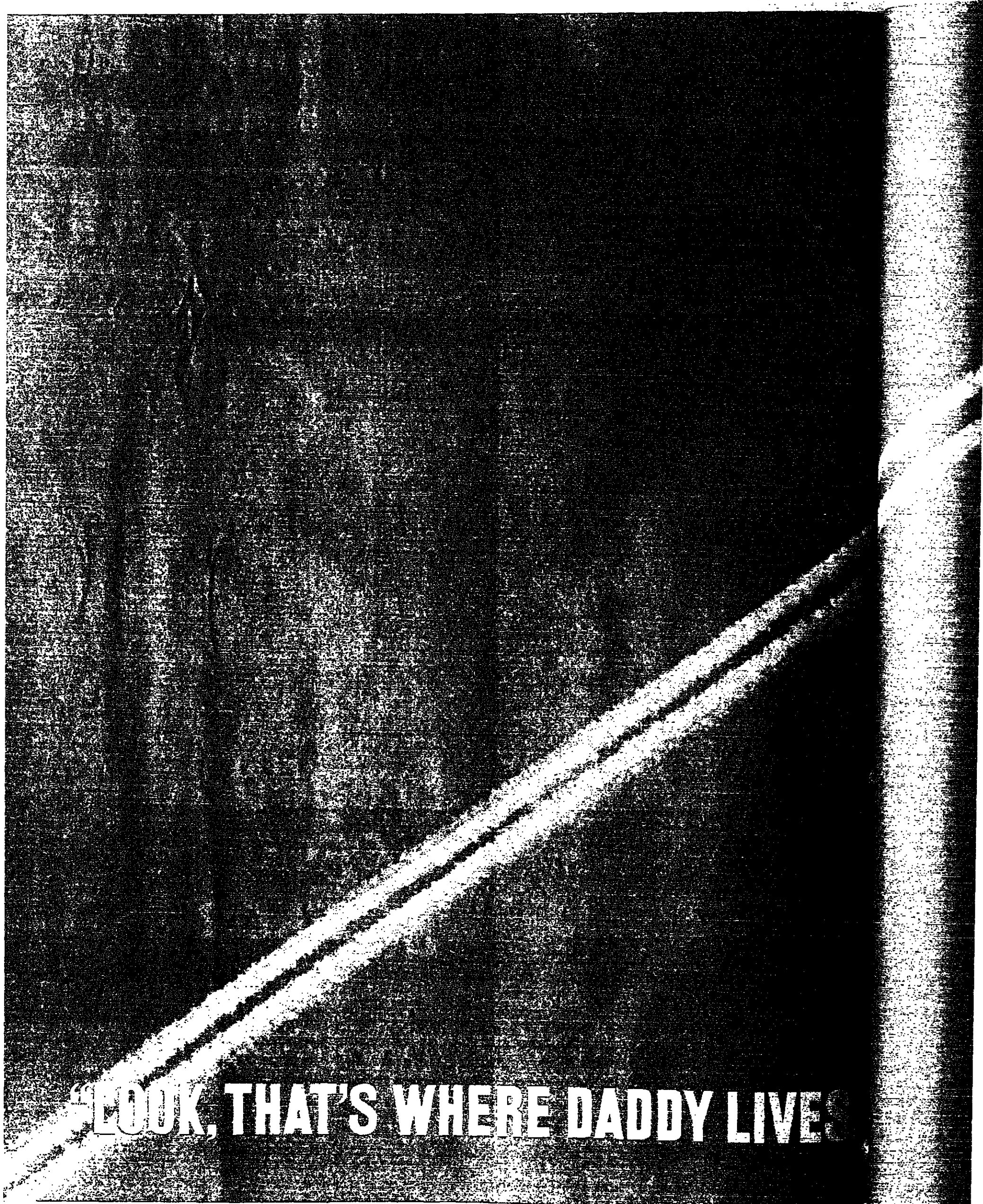
the delay in introducing new services lies in a lack of competition.

Liberalisation of the telecoms market in 1985, which opened up the domestic market to three new long-distance carriers, resulted in significant competition in the long-distance market. But "there is still not enough competition in the local market," points out Mr Norio Nakamura, senior assistant director of the Industry and Telecommunications Department at Keidanren, the business organisation.

Without effective competition in the local market, NTT has little incentive to cut costs so that it can reduce prices. Neither will it have much reason to speed up modernisation of its local network or to bring new services to the market.

Japanese business leaders are convinced that with the maturing of manufacturing industries, telecommunications will be an important engine of the Japanese economy in the 21st century.

But for the development of multimedia and other new telecoms business which are expected to support future growth, "telecommunications rates have to be low and services have to be widely available," Mr Nakamura says. As Japanese authorities debate the telecoms regime in a fundamental review to be concluded next March, those considerations will be a decisive factor in setting the future course of the industry.



LOOK, THAT'S WHERE DADDY LIVES

JUN 15 1995

By Andrew Hill
in Milan

International perspectives: Italy

New alliances take shape

It is probably no exaggeration to say that the Italian telecommunications sector has seen more changes in the past year than in the previous decade.

This year alone has seen the formation of a series of new telecommunications alliances aimed at the business market. And within the last year, even the state-controlled sector has undergone a metamorphosis - evolving from a complex collection of linked operating companies, some quoted and some wholly owned by the state, into a single entity, Telecom Italia.

The overall structure is still relatively complicated. For example, a majority of Telecom Italia's shares are still owned by Stet, the state-controlled telecommunications holding company which could be privatised later this year. But for the business client, who used to have to deal with different operating companies for domestic, European and international calls, the Telecom Italia merger has greatly simplified matters.

It has also, according to Telecom Italia, made it easier for the state-controlled company to attract business. "Up to a few years ago, ahead of the restructuring, we had difficulty competing," claims Mr Girolamo Di Genova, responsible for business clients at Telecom Italia. The change of name has also distanced the phone company from Sip, its predecessor, the domestic operator, which

until recently had an unenviable reputation for inefficiency.

While Telecom Italia has restructured and modernised, rival ventures, including British Telecommunications, Cable & Wireless, AT&T and the Unisource alliance, have begun to make in-roads into its established business.

The latest alliances, aimed initially at the business client, include Infostarda, the computer group; Bell Atlantic, the US telecoms company; and Albacom, which links BT's expertise with the existing communications infrastructure set up by Banca Nazionale del Lavoro (BNL), one of Italy's biggest banks.

Nevertheless, Telecom Italia remains the company to beat in Italy. As an illustration of its importance domestically, both the Italian group and its foreign competitors still assess the potential size of the business market with reference to the state-controlled company's turnover.

Mr Di Genova estimates that in the business sector, some 12,000bn of annual turnover is already deregulated, and perhaps 15,000bn will be open to competition by 1998. But even then Telecom Italia's business services division will have an

exclusive hold on about 13,000bn of sales related to infrastructure charges and other protected areas.

Mr Di Genova points to Telecom Italia's home advantage in ISDN (integrated services digital network) and wide-band communications for academic and scientific use.

"No competitor can beat this offer [of services] unless they invest what we've invested in the past few years," he claims. Even rivals point out that how-ever attractive their range of services, they still have to lease the so-called "last mile" of wire, which links the consumer to the private company's communications node, from Telecom Italia.

But Telecom Italia is not resting on its laurels, and competitors are not reducing the pressure on the market leader.

The past year, for example, has seen an acceleration in the number of companies preparing to outsource telecoms services. Telecom Italia points out that whereas it won only 15 large contracts for outsourcing in 1993, it had 35 in 1994 and has already agreed 40 in 1995.

For example, Telecom Italia won an important contract to manage the telecoms needs of Pirelli, the tyre and cable manufacturer, which, under its

managing director Mr Marco Tronchetti Provera, has been placing increasing emphasis on internal communications, including the use of video-conferencing and other advanced techniques.

Olivetti recently decided to reverse its decision to sell a data processing subsidiary because of the potential for outsourcing of data processing and telecoms services.

Foreign companies have tended to concentrate until recently on winning international business. For example, by bidding aggressively against Telecom Italia and other international groups, Cable & Wireless, the British telecoms group, won a contract in March to handle the international telecoms needs of Snam, the gas company which is part of Eni, the state-owned energy and chemicals group.

On the domestic market, competitors have been hindered partly by Italy's sluggishness to implement European Union directives on the liberalisation of specialised telecoms services, and Telecom Italia's desire to prevent a free-for-all in its own market.

In January, however, Telecom Italia was rapped over the knuckles by Italy's anti-trust authority for failing to allow

Telsystem, a small Milan-based company, to lease lines from the national operator to offer business services, such as so-called "virtual" telecoms networks linking a company's offices. Mention of the Telsystem case still irritates Telecom Italia executives, who accuse the small company of simply taking advantage of the state-controlled company's rigid tariffs.

But larger competitors have also taken advantage of the ruling to step up their marketing of services within Italy. Mr Michael Yates, marketing manager for BT's Italian operation says: "We can now offer all the data services, nationally and using the Concert alliance with MCI [the US telecoms group] internationally."

BT's agreement with BNL also gives the company the chance to use a domestic network with more than 100 nodes in Italy, compared with the 18 to which BT had access before. "We had two possibilities if we wanted to offer domestic services: either to install other nodes throughout the country or buy the network from someone else," says Mr Yates.

Mr Stefano Borghi, the new chairman of Cable & Wireless Italia, believes that in the medium term there is some-



This year has seen the formation of a series of new alliances aimed at the business market. Picture: Sarah Murray

International perspectives:

Germany

Monopoly comes under fire

By Michael Lindemann
in Bonn

Criticising the quality of telecommunications services in Germany has become a favourite pastime in recent years - especially as more and more business users have realised that they are not being offered the prices and the quality that is available in more liberalised markets such as the UK, Sweden or the US.

In those and other markets, several national telecoms operators are already competing with each other, a process which has improved the quality and quantity of services available to corporate users.

However, business users in Germany, the world's third-largest economy, are still beholden to monopoly operator Deutsche Telekom which, although it has made notable progress in recent years ahead of a partial privatisation in 1996, still provides services which, users say, are much too

often voiced by business users. Deutsche Telekom has focused its resources on expanding its Integrated Services Digital Network (ISDN), the 64 kilobit lines which are well suited to the Internet and other multimedia services - where Germany has now created one of the world's largest networks.

Mr Eickers accepts that ISDN is a valuable asset but that it is too technical and largely meaningless to most business and private users who would rather have value-added services such as EID.

When confronted with complaints from business users, the BMPT argues that Germany is by no means the slowest among European countries to liberalise its telecoms market. The monopoly should be maintained until 1998, the BMPT says, so that Deutsche Telekom can prepare for privatisation and, among other things, generate the revenues needed to pay for the DM50bn investment programme undertaken in former East Germany since 1990.

But while liberalisation may be moving too slowly for many business users, progress is nonetheless being made.

For months, private operators such as the utilities RWE, Veba and Viag - all of whom want to provide corporate network services before 1998 - had been complaining that the government and Deutsche Telekom were flouting European Union guidelines by insisting that such services could only be provided to a so-called closed user group - third parties with whom the operator has a long-standing business relationship.

At the beginning of May, the BMPT acknowledged that its definition was too restrictive and fell in line with the more relaxed criteria used by Brussels.

Changes in the way telecoms services are provided in Germany have also been stymied by the fact that lobbies representing business users' interests are relatively undeveloped and are still bound to

Like others, AFT complains that the cost of calls in Germany is still too high

Deutsche Telekom. The Anwenderforum Telekom (AFT) is the only group of its kind and represents about 250 companies. It was started in October 1992.

Like many other groups and business executives, AFT complains that the cost of calls in Germany is still too high in comparison with the international competition - a fact that feeds through directly into the cost of corporate networks because private companies wanting to offer such services still have to rent the lines from Deutsche Telekom until 1998.

However, Mr Dietmar Stosiek, an AFT spokesman, says that a variety of AFT demands - including a help desk for international lines and improved standard fixed lines - have already been implemented by Deutsche Telekom. AFT's first big study into corporate networks was not funded by Deutsche Telekom but the company does finance an unspecified variety of AFT "association costs" which, as one observer pointed out, raises questions about the organisation's independence.

Meanwhile, well over two years before competition begins in earnest in Germany, in 1998, many of Germany's biggest companies are looking very closely at products on offer from international competitors such as AT&T, the US telecoms operator, or BT.

That, says one telecoms analyst, is ample evidence of the fact that many Deutsche Telekom clients remain dissatisfied with the quality and cost of services on offer.

Business users have a choice between 64 kilobit telecoms lines or 2 megabit lines

expensive and not tailor-made for business users.

"Companies are complaining that prices are far too high compared to the international competition," says Mr Berthold Gellner, a telecoms specialist at the Bundesverband der Deutschen Industrie, the umbrella organisation for 80,000 German companies.

Apart from prices which remain far higher than in the US or the UK, Deutsche Telekom is not providing the variety of services available in other competitive telecoms markets, says Mr Gellner. Chairman of the Verband der Telekommunikations- und Mehrwertdienstleister (VTM), a group which represents private providers of value-added telecoms services.

Business users in Germany have a choice between 64 kilobit telecoms lines or 2 megabit lines. There are no other capacities in between these two and 2 megabit continues to be the ceiling - a situation which remains very unsatisfactory when compared with the US and other countries where bigger capacity lines are available, says Mr Eickers.

Furthermore, so-called intelligent services such as virtual private networks - where companies can phone around the country as if they were on their internal corporate network - continue to remain unavailable because Deutsche Telekom has not made the necessary investment in digital exchanges and other facilities. The same goes for other value-added services such as e-mail and Electronic Data Interchange (EDI), Mr Eickers says.

One particular example has highlighted the inadequacy of Deutsche Telekom's services for business users. The Deutsches Forschungszentrum (DFN), an association of about 350 universities and industrial research institutes has for years had to make do with 2 megabit lines to link up laboratories throughout the country.

The DFN needs lines with a capacity of 34 megabit or more to move data packages round the country, but Deutsche Telekom has so far offered such services only at prices which the research institutes cannot afford, a DFN spokeswoman said.

After years of waiting, DFN hopes to begin modernising its network this autumn. It is in talks with German telecoms operators which can provide the bigger-capacity lines and hopes to receive a licence for the project from the ministry for post and telecommunications (BMPT) this summer.

Rather than focus on tailor-made solutions, a criticism

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TELECOMMUNICATIONS IN BUSINESS 8

US developments: deregulation

Change seems inevitable

By Tony Jackson
in New York

For US business users of telecoms, one of the most far-reaching items on the agenda is deregulation. With separate bills for telecom reform under consideration by Congress and the Senate, change seems inevitable. The question is how far business users will benefit and that depends above all on the legislative detail.

The basic premise is that the present regulatory framework in the US has created a network of local and functional monopolies. In turn, these give rise to monopoly rents. It follows that if the system is made genuinely competitive, the customer stands to gain on price.

By the same token, producers stand to lose. As a result, says an executive from one big US corporate customer, the initial motive for deregulation risks being distorted. "The whole thing that drove this," he says, "was the need to create an infrastructure. But the practical politics are being totally driven by companies trying to reposition themselves in a radically changing world."

A clear example of this is the debate over allowing local and long-distance telephone companies to compete in each other's markets. Since the break-up of AT&T a decade ago, this has been forbidden on competition grounds. In principle, both the House and Senate bills are now working to change this. The crucial question is one of timing.

Mr Tim Regan, of the US multinational Corning (a big telecoms user, but also a leading supplier of fibre optics to the industry) says that if long-distance companies are allowed to provide local telephone services but not vice versa, the results could be devastating.

What then happens, he says, is that the local company - one of the hugely powerful Baby Bells, such as Nynex or US West - sets itself up as a least-cost provider of routing schemes for long-distance calls. "Then the company tells me, as a customer, that it will collect services from all the 25 or so long-distance providers for the community, and will provide the cheapest solution. Then AT&T and the other long-distance companies will become

wholesale providers of a commodity, and the local company becomes the monopoly retailer."

The result, he makes clear, would be very bad news for the customer. "If [deregulation] is done right, the customer squeezes all the rents out of the system. If it's done poorly, and local phone companies get into these other areas before the monopoly is broken, it's a disaster."

The point is reinforced by Mr Michael Brown, vice-president for federal legislation at AT&T. It all comes down, he says, to doing things in the proper sequence. "There are three ideas here: monopoly, competition and deregulation. The first step has to be to end the existing monopolies. If you move to deregulation before tackling the monopolies, you may not get

For business customers, the challenge is different to move from a world of monopolies to developing the ability to choose between suppliers

competition." So far, there seems general agreement that both the House and Senate bills are aware of this threat, and that the result should be genuine competition between local and long-distance suppliers in each other's markets. At the same time, there will be relaxation of the rules which keep telephone companies out of the cable TV market, and vice versa.

The promised explosion of choice will then confront the industry and its customers with a central question: whether to take services, from voice and video to computer data and components, from a one-stop shop provider or from niche providers of specialised services.

It seems clear that all the big phone companies, at least, will push the one-stop option as hard as they can. Mr Michael McDonough, president of business markets at the local telecoms giant GTE, says: "We and the other larger suppliers will compete on a package basis - voice, video and wireless - against the smaller niche suppliers. There will be winners and losers, depending on which particular areas of the customer base they choose to compete in."

As for the industry giants, he suggests, the key to success in package solutions will lie in technical expertise rather than price. "Many of us will have similar strategies, and it comes down to execution - especially speed - with cheapness less of an issue."

For business customers, the challenge is different: to move from a world of monopolies to developing the ability to choose between suppliers. As Mr McDonough points out, for many US business customers the arrival of specialist competing phone companies such as MFS Communications means the local monopoly no longer exists. All the same, he says, "the challenge for business customers is how to manage across multiple suppliers."

From the customer's viewpoint, there is one other central issue to be determined in the deregulation debate. At present, telephone and cable TV companies are largely barred from each other's markets. The convergence of technology means they are starting to invest heavily in duplicating each other's functions.

In an unregulated market, this duplicated effort would be promptly stopped by the process of merger between telephone and cable companies. The Senate and House bills differ on how far this should be allowed: the Senate would permit it on a local level, Congress only within communities of under 35,000 population - less than 15 per cent of the US population.

Mr Brown of AT&T sees real competition starting to appear within the next year. "You'll see the cable companies offering the real real time interactive networks, including voice, and the phone companies offering video." But he is not unduly worried about the threat from merger. "Both the Justice Department and the FCC (Federal Communications Commission) would look at any merger under existing laws, and they're not being over-ridden by either of the bills."

Nevertheless, the threat remains that monopoly will re-emerge under another guise. As Mr Regan of Corning puts it, "this gets to the core of what the deregulation bills are about. Are we building an infrastructure, or are we reshuffling the same deck of cards?"

By Louise Kehoe
in San Francisco

The US cellular telephone industry reached an historic milestone earlier this year when it tallied a total of 25m customers. One out of every 10 Americans now has a cellular phone. The industry's customer base has more than doubled in the past two years, with new customers signing up at a rate of 23,000 a day.

The industry posted record gains in revenues, capital investment, new jobs, and cell sites last year, according to the Cellular Telecommunications Industry Association (CTIA), a trade group representing cellular telephone companies. US cellular revenues for 1994 exceeded \$14bn, an increase of 30 per cent over \$10.9bn in 1993. While revenues rose sharply, cellular service prices continued to decline. The average monthly customer bill dropped to \$66.31, compared to the 1993 average of \$61.48 a month.

The industry invested a record \$2.9bn in new equipment and infrastructure during the last six months of 1994. In 1994, the number of new cell sites, the basic building blocks of a cellular system, increased by more than 5,500 - a 40 per cent increase - to a total of 17,930. As the industry data demonstrate, the cellular telephone has moved beyond the business market to become a mass market consumer product in the US. It remains, nonetheless, a critical business tool. What is more, enhancements in wireless communications ranging from cellular data communications to personal communications services promise continued expansion of business applications.

Several US cellular telephone service companies have augmented basic telephony with integrated wireless services such as data access, faxing and paging. Cellular phone companies also offer services such as voice mail, information services, and even roadside assistance for motorists.

The US cellular industry faces new challenges, however, with the development of digital cellular technologies and the anticipated launch of new "personal communications services" (PCS) also known in the UK as personal communications net-

Cellular telephones

Uncertainty over standards

works. The high penetration of analog cellular services in the US has created a market barrier to the introduction of digital cellular and PCS. By the time PCS is launched in the US, in about a year's time, cellular penetration will exceed 13 per cent of the population, according to Herschel Shostack Associates, a market research firm.

In contrast, when PCS networks were introduced in the UK and Germany, cellular penetration was less than 3.5 per cent of population.

The prospects for digital cellular and PCS in the US market are further complicated by the lack of agreed standards for either. The options include several variants of Time Division Multiple Access (TDMA), Code Division Multiple Access

claims. The technology also could provide a solution to the overcrowding that is evident in some of the most heavily-used analog cellular systems. This overcrowding results in blocked calls, dropped calls, and "cross-talk".

The biggest drawback of CDMA, however, is that it is incompatible with existing digital cellular and PCS systems in Europe and elsewhere. Also, several US cellular companies have already committed to TDMA or GSM.

In a recent analysis of the prospects for each of the competing technologies, Merrill Lynch analysts concluded that no single standard for digital wireless communications will emerge in the US. In the PCS arena, Sprint appears to be committed to using GSM technology, according to the Wall Street analysts. However, AirTouch, USWest, Bell Atlantic and Nynex, the largest US regional operators, are championing CDMA technology in cellular networks.

AT&T, the largest US cellular telephone service provider since its acquisition of McCaw Cellular, is already using TDMA technology. More than 500,000 subscribers were using the digital service at the beginning of this year and the number is expected to grow to about 1m by the end of the year.

However, when it comes to PCS, "AT&T will support whichever PCS standards our customers demand, but we believe strongly that North American standards - like CDMA or TDMA - are better suited to the North American market than are European standards, because of their overall compatibility with the North American network - particularly in terms of interconnection to existing cellular networks and the rest of the Public Switched Telephone Network," said Jim Brewington, president of AT&T Network Wireless Systems, which supplies equipment to telecommunications companies.

For wireless communications users - whether they be businesses or consumers - the standards debate creates uncertainty that is likely to bolster the status quo and delay the adoption of new technologies. The US analog cellular market is thus expected to continue its rapid growth for at least another 12 months.

Wireless communications

Firing imaginations

By Geoff Wheelwright

Wireless communication appears to be all the rage in the US at the moment - with paging companies, computer manufacturers and service providers all rushing to cash in on it.

One recent recipient of a great deal of industry attention in this area is telecommunication giant AT&T - whose PersonalLink wireless data communications service seems to be firing the imaginations of hardware developers who have developed wireless hand-held computers and "communications" as part of this awareness.

AT&T's catalogue of PersonalLink Services bills itself as "the first commercial service that enables its subscribers to employ intelligent messaging with the help of intelligent assistants".

For example, subscribers can send electronic mail to one another using only their names to address the messages. They can automatically forward messages from particular people to someone else's computer or paging device, or have copies of messages about specific subjects made and sent to colleagues.

In the future, intelligent assistants will be able to perform even more complex tasks, such as notifying subscribers of changes in stock prices, searching publications and data bases for information of particular interest to the subscriber, or making travel reservations.

AT&T says that today's messaging networks are essentially message-switching operations "with limited flexibility for tailoring applications to particular needs". In contrast, AT&T says its PersonalLink Services is operated as a message processing network.

Users can send "smart messages", incorporating intelligent assistant software that interacts with intelligence in the network to perform operations that otherwise would require timely human intervention and constant attention.

PersonalLink is used by both of the most highly-publicised hardware releases of the past year - the Sony Magic Link and the Motorola Envoy - and was at the heart of Panasonic's announcement of its personal communicator at the Consumer Electronics Show (CES) in January.

According to Bill Weber, the PersonalLink Services wireless program manager at AT&T in the US, Americans may soon

be joined by Canadians and Europeans as users of this service.

The company is discussing partnerships with several international telecom providers to arrange this. It will not happen overnight, however.

"Our expertise and focus is in the US (right now)," says Mr Weber. "Using PersonalLink, wireline and wireless capabilities are fully integrated. Wireline and wireline communications are normally separate, but with our service and the user interfaces being deployed on these devices (such as the Magic Link and the Envoy), they are seamlessly integrated."

AT&T gave it the name PersonalLink Services because it is supposed to be able to accommodate each subscriber's personal preferences for handling day-to-day tasks with the help of the "intelligent assistants".

Intelligent assistants can be thought of as extensions of the

Every PersonalLink Services subscriber is assigned a mailbox

people who dispatch them, and are brought to life by Telescript technology - a new communications language developed by General Magic. AT&T PersonalLink Services is the world's first communications service to incorporate Telescript technology.

Mr Weber explains that Telescript is to the telecoms world what the PostScript computer printer language was to the printer world. "These intelligent agents and assistants handle messages and interact with AT&T network," he explains.

Telescript agents and intelligent assistants operate not only at the device level - they are not just sending ASCII (American Standard Code for Information Interchange) messages, but also these agents through interpretive computer networks. There are agents on the sender's mailbox and agents on the recipient's destination device.

In the US, people can subscribe to AT&T PersonalLink Services when they buy a personal communicator or other device that incorporates Telescript language capabilities. The first commercially available product with PersonalLink Services and Telescript built in was the Sony Magic Link personal intelligent communicator - although the Motorola Envoy had been announced before the Sony device.

Through an electronic registration process, every PersonalLink Services subscriber is assigned a mailbox, or address in the "electronic community".

Subscribers get personalised messaging through a messaging service called PersonalLink Mail, which was designed by AT&T specifically for Person-

alLink Services: a free news service called AT&T PersonalLink Daily News Summary (with information created and supplied by Lexis-Nexis Services); optional automatic delivery of software enhancements to add new features and upgrades; the ability to personalise messages with animations, brief voice recordings, music, electronic ink, and decorative stamps; and a range of connections both wireline and wireless.

Through a gateway to AT&T EasyLink Services, AT&T boasts that subscribers should be able to reach and be reached by people on public and private messaging services, including the Internet. X.400-based mail services, and local area network-based mail systems.

The company also pledges that subscribers can send messages to virtually any fax machine in the world.

Using PersonalLink Mail intelligent assistants, subscribers have access to what AT&T calls powerful "filtering" capabilities, which means they can screen messages based on who is sending the message or what it is about. These filtering abilities work for messages sent from other PersonalLink Services subscribers as well as messages from people using other services, such as the Internet.

While all of these plans may seem rather "pie in the sky" to users outside the US, the fact is that they will probably catch lots of people's imaginations. With a growing mood of deregulation in almost all world markets - and a desire to see global operation of wireless services being driven by telecom giants such as AT&T - it would not be surprising to see services such as AT&T PersonalLink in a number of markets outside the US within the next couple of years.

General Magic will be doing its best to make this happen by arranging further deals to put its Magic Cap operating system on other hand-held computers over the next year. The company is developing a desktop version of Magic Cap so that desktop computer users can also have access to wireless messaging and exchange messages more easily with Magic Cap-based communicators.

This is a very powerful idea. One strong indication of just how powerful the idea is came from Wall Street in mid-February when General Magic shares almost doubled on their first day of stock market trading.

The value of the stock rose 90 per cent in a single day. General Magic promised to use the \$77m it garnered from the single-day sale of \$5m shares as working capital.

So it looks as if the future is "up in the air" for users of hand-held computers - it is now only a question of when that future hits markets outside the US.

INTRODUCING A GATEWAY TO LONDON THAT MADE A CELLULAR OPERATOR SMILE



Tim Roberts is project manager of Mercury One-2-One, the world's first personal communications network, serving over 200,000 people in the South East and West Midlands. Tim enjoyed the experience of the world's leading supplier of digital and analog cellular systems.

It happened one June day in 1993, in one of the more quiet corners of central London. Tim Roberts was inspecting the construction of the new Mercury One-2-One cellular system, when all of a sudden it hit him that he could improve the system.

To ease the flow of traffic and to untangle administration services, Tim envisioned a management gateway. (Sort of like the innovative mechanism used to control the flow of water in the Thames river, if you will.) It gave customer service attendants a tool to better manage the network.

Dreaming up this idea was one thing, making it happen was something altogether different.

With ten months to go until the system had to be operating, Ericsson brought in a group of six specialists. Their demands were simple: Total access to Tim; plus the freedom to think and act creatively.

Soon they criss-crossed the North Sea in a process where ingenuity is everything, and the specialists were an ingenious team if there ever was one. Fifteen thousand man hours, and eight months later, they delivered.

Aside from the 110,000 inquiries the One-2-One network received on opening day, the families of the engineers were delighted that the team were back in Sweden two months ahead of schedule.

Much like the people who made the Thames river idea happen, Ericsson makes cellular happen.

Ericsson Radio Systems AB, S-164 80 Stockholm, Sweden.

ERICSSON

TELECOMMUNICATIONS IN BUSINESS 9

International perspectives: China

A breach in the wall

By Tony Walker
in Beijing

China United Telecommunications, a fledgling telecommunications company, is due to put China's first digital cellular network into operation in July.

This will be an event of no small importance in the evolution of the world's fastest-growing and, potentially, biggest telecommunications market.

China Unicom's venture will mark a significant breach in the wall of the state telecommunications monopoly.

China Unicom was launched last year as the operator of a second telecommunications network in tandem with the all-powerful Ministry of Posts and Telecommunications.

While representatives of the new company, which is backed by the ministries of electronics, electric power and railways, said their aim was not to compete directly with the MPT, competition is inevitable.

Unicom's first venture is in Shanghai, China's fast-evolving business centre. The new digital cellular phones will provide higher quality and more secure lines than the analog system presently in use.

This is a pattern Unicom plans to repeat throughout China.

Western telecommunications companies, including both operators and manufacturers of equipment, have welcomed Unicom's birth as an important sign that China at last is freeing up its heavily-regulated telecommunications sector, but Beijing has made it clear that for the time being foreign companies will not be allowed to become directly involved in network operations.

This has not prevented foreign operators seeking opportunities as consultants and partners to both the MPT and Unicom. Telstra of Australia last month became the latest foreign telecommunications company to open an office in Beijing, and representatives made no secret of the fact that their ultimate aim is a share in China's network operations.

Other foreign companies eyeing China's network operations covetously include Ameritech which is an expert in systems management; AT&T, voice data; British Telecom, electronic mail services; Hong Kong Telecom, transmission facilities; IBM, assistance for development of China's new "superhighway"; Hughes Network Systems, satellite earth stations; and Nynex, network assistance for China Unicom.

China's telecommunications operations is hardly surprising, given requirements. The MPT spent some Yn54bn (\$6.6bn) last year on extending the network. China plans to outlay Yn15bn, including \$7bn in loans from abroad, by the end of the century with the aim of achieving a national telephone penetration rate of 8-10 per cent (phone lines per 100 people).

Some 17 of 22 fibre-optic lines have been completed, leaving a handful of important projects for this year.

This will mean increasing present numbers of phone lines from about 30m to 110m by the year 2000, requiring the installation of some 12m lines every year - equivalent to Britain's telephone network each three years.

According to MPT figures, released last month, 13 per cent of China's urban families had telephones at the end of 1994, and phone lines per hundred of the population had reached 32 compared with 0.6 in 1985.

Numbers of phone lines installed in 1994 surpassed 10m for the first time, reaching

10.83m, of which 70 per cent were private. This year, China plans to lift the penetration rate to 4.2 per cent, and a new digital data network will be installed to link some 500 cities and townships.

China is also pressing ahead with ambitious plans to extend a fibre-optic cable network specified in the eighth five-year plan (1990-91 to 1995-96). Some 17 of 22 fibre-optic lines have been completed, leaving a handful of important projects for this year. These include Beijing-Xian; Beijing-Guangzhou; Beijing-Lanzhou; and Hangzhou-Chengdu.

China's huge requirement for a vast range of telecommunications equipment has proved irresistible for foreign companies which are now involved in a vast array of activities - from manufacturing fibre optic cable to producing cellular phones and paging systems.

China's cellular phone market is set to explode. According to a recent survey, numbers of cellular phones will increase by 500 per cent over next two years, bringing mainland users to 3m. But pirating problems are serious. Theft of phone numbers is a common occurrence.

Motorola leads the pack in

terms of investment in the production of telecoms equipment, having committed some \$300m by the end of 1994. The US company has indicated it will have invested \$2bn by the year 2000 in plants manufacturing papers, cellular phones and semi-conductors.

AT&T, Ericsson, Northern Telecom, Alcatel, Siemens, NEC, GPT, Fujitsu and Nokia, to name some of the more prominent players, are all involved. AT&T, after a slow start, is investing \$150m in eight joint ventures producing such items as optic-fibre cables and switching systems.

Apart from extending its phone system as a matter of urgency, China has also embarked on the development of its own superhighway to provide facilities for high-speed data transmission. China has dubbed this scheme the "Three Golden" project - Golden Bridge, Golden Customs and Golden Card.

Among immediate priorities is the upgrading of China's customs system, and also provision of links for data, voice and video servicing an ever-widening circle of users in the private and public sectors.

China is also establishing facilities for an explosion in credit card use. Jitong Communications, the corporate arm of the Ministry of Electronics Industries, like China Unicom with the telephone network, is providing an alternative to the state monopoly in the development and delivery of data services.



Work on a 1,400km digital transmission link from Wuhan to Chongqing in China, supplied by GPT



A GPT telepoint system in use in Ningbo, China plans to spend Yn450bn by the end of the century

FAXES

New products on the way

With the advent of computer communications, one might have been tempted to ring the death knell for fax. But far from dying, fax is continuing to grow, although it is adapting to demands from customers for computer links.

It is estimated that there are now between 50m and 100m fax machines in use worldwide and the number is still growing. In the UK alone, there are 1.5m installed machines, and 420,000 new machines were sold in 1994. The indications are that 1995 sales will exceed that number.

However, fax manufacturers are aware of the need to keep up with the demand for computer communications. The latest developments focus on direct connections between fax machines and computers, so that people can send faxes directly from their computer or network. The new products are being designed as an "all-in-one" office machine that can be used as a scanner to scan into the PC, as a printer and as a copier, fax or PC-fax. They are sold with software which lets an individual user control the machine directly from a PC.

Some manufacturers such as NEC, Ricoh, Konica and Oki already have an all-in-one machine in their range. But these machines are in the higher price bracket and are intended for use on computer networks only. The Nefax 545 costs £2,495, for example.

Lower-priced all-in-one machines will come with the ratification of a new international standard for a PC to fax machine interface. The international standards body, the ITU (International Telecommunications Union), has been drawing up a standard interface in collaboration with the fax industry. In March, the Telecommunications Terminal study group, which is responsible for producing the new standard, issued a consultation paper. It is expected that the standard will obtain full approval later this year.

Once the standard is in place, manufacturers will have the opportunity to source parts for the interface at lower cost. And fax software companies will be able to design software that will work on any machine. In most cases, this software is likely to be designed by specialist companies, which work closely with the manufacturers. Oki and NEC are both working with UK-based Wordcraft International, which produces a package called LaserFax.

Efforts were in place by the manufacturers themselves to design a global standard software package in tandem with software giant Microsoft. Known as Microsoft at Work, this software had been intended to provide a Windows-style interface for fax machines and other office equipment. However, according to Mr Lester Davis, chairman of the British Facsimile Consultative Committee, this project has stalled.

"To make a fax machine work like that, you have to put a Windows processor inside. But Windows is exhaustive in its data processing requirements. When trying to put it in a fax machine, you have to go from a simple 'few

bits" processor, to something like a 386," he explained. Apart from a few demonstration machines, no fax machines running Microsoft at Work have so far been made, according to Mr Davis.

One of the benefits that users could hope for from the new software is that it will be better designed than many existing packages. PC fax software has to date been designed by small, technically-orientated software companies, with low market awareness. Typically, the packages are either not very robust or they introduce technical issues that the users will have problems in dealing with.

Further fax developments focus on security and speed. The ITU study group is also considering a secure transmission standard, whereby an encryption system could be included inside fax machines. The encryption would ensure that the fax could not be read by anyone other than the intended recipient.

Today, if anyone wants to send secure faxes, they have to buy a dedicated scrambler box, at a cost of between £1,000 and £1,800. The box can only communicate across a direct link to another box. That would take the total cost to set up the secure transmission to more than £2,000.

According to Mr Davis, once the standard is in place, manufacturers will be able to include secure transmission capability in a machine without putting up the price too much. "We anticipate that it could be used by businesses at a fractional increase on a £500 machine, at a point that they would not squirm at paying," said Mr Davis.

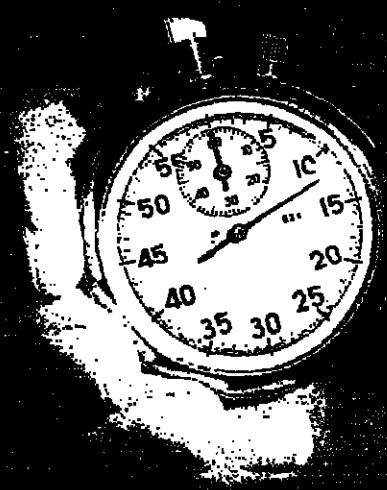
Fax machines incorporating the secure transmission standard are not expected before 1997. However, some manufacturers such as Oki do have fax machines with a non-standard encryption under development. These machines could cost £2,000 or more and are intended for specialist markets, such as defence, where secure transmission is important.

Higher-speed fax machines, however, will be available much sooner. The latest ones can operate at 28.8Kilobits a second, for which an international standard has recently been approved. Higher-speed machines reduce the cost of transmission because the documents get through more quickly, and businesses such as law firms, banks and insurance companies which make very high volume transmissions will notice the difference.

However, another new range of very high speed machines which operate on ISDN lines at 64Kilobits a second, have been put on hold by the manufacturers. According to Mr Davis, it was expected that these would have been shown at the CeBIT Hannover Fair in March, but none were. He blames a lack of understanding among customers of the benefit of higher speeds, which means that the manufacturers have a more difficult job in selling them.

Monica Horten

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for what you say

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We're cutting the average
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TELECOMMUNICATIONS IN BUSINESS 10

Mobile telephony: Joia Shillingford monitors developments

Next big market will be in data

The business market for mobile phones is maturing, yet mobiles are not as ubiquitous as they seem. Cellnet's figures show that although 81 per cent of large companies in the UK have mobiles, only 18 per cent of staff use them. And mobile phones are not fully established in small professional businesses, such as firms of architects.

The next step is for mobiles to progress from being just a mobile version of fixed phones, into a properly converged product. This is already starting to happen.

Cellnet's Personal Assistant (PA) makes use of both fixed and wireless networks. Each user is given a single phone number and the PA software knows when they are most likely to be in the office or car, or at home.

When a caller rings the number, PA tries the most obvious phone (eg the office) and, if there is no reply, automatically tries the next most likely location (eg the mobile phone). PA has not been released yet; a trial of 500 users is under way.

Mercury One-2-One has a product which directs some of the calls that would usually go to a small company switchboard to mobiles. What happens is that when a caller phones the switchboard number, the call is automatically routed to one of a group of mobile phones.

The next time it rings, it goes to another of the mobiles and so on. This means that a small firm of architects, for example, whose staff are out a lot of the time, does not have to pay for a dedicated receptionist.

A number of follow-me services have also been introduced by fixed network operators such as Mercury and BT. These can switch calls from a fixed to a mobile number.

But the idea of universal personal telephony—where you are given a single number when you are born and retain it until you die—is still some way off, according to Bryan Van Dussen, a senior analyst at the Yankee Group Europe.

The obstacles are as much commercial as technological. "Although the idea appeals to mobile operators, it could

make mobiles appear to be little more than an extension of the fixed network," says Mr Van Dussen. "And then people might expect to pay less."

In the short term, what interests mobile operators is how to get people to spend more on mobile services. One way is to offer mobile data.

"Mobile data will be the next big mobile market," says Hubert Tardieu, head of telecoms at software and services company Sema. "It is likely to be even bigger than the market for mobile voice." This is partly because there are a large number of potential applications for the technology.

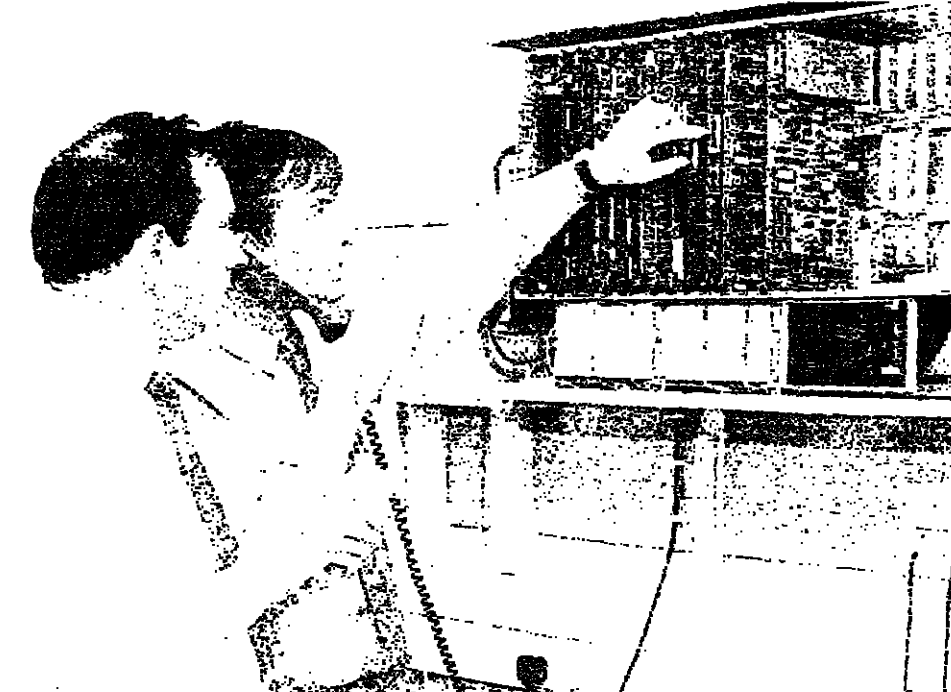
Two types of mobile data can be transmitted over the current generation of digital mobile networks such as GSM (Global System for Mobile) and variants such as PCN (Personal Communications Network). One is the Short Message Service (SMS), which is rather like alphanumeric paging and allows messages of up to 160 characters to be transmitted. This forms part of the GSM standard.

Data can also be transmitted from a portable PC as, say, electronic mail or faxes, via GSM. All the user needs is an interface card slotted into the PC. This has a cable which links the card to a suitable GSM phone (such as Nokia's) and allows data to be transmitted via the wireless network into the fixed one.

Digital networks are better for data transmission than cellular networks because speeds are higher and data is less likely to be corrupted.

Mobile operators providing data services include Vodafone (in the UK), Deutsche Telekom and Mannesmann (in Germany) and Telia in Sweden. SMS has been a big success in South Africa where it is used for fleet management (helping to locate and issue new instructions to truck drivers), but the technology is most commonly used to notify users of new voice messages. Hutchison's Orange PCN network plans to introduce mobile data at the end of June.

In addition to mobile data, network operators are trying to generate extra revenue and



Technical support engineers at GPT Communication Systems maintain fixed and cordless exchanges



GPT offers two-way messaging-paging with in-built acknowledgements

gain competitive advantage by offering enhanced services. According to Dataquest, a quarter of cellular phone subscribers used voice mail in Europe last year.

Voice messages, left by callers when the mobile they are calling is switched off, are usually free but generate extra

calls. Kim Fennell, managing director of Octel Communications Europe, which provides the voice messaging system used by Mercury's One-2-One network, says that using voice mail adds at least 20 per cent to a network operators' revenues.

In addition, voice mail can

be used to provide information services. Visitors to South Africa for the Rugby World Cup can dial voice mail numbers on the Vodacom mobile network to find out about hotels and restaurants.

Swedish telecoms operator Telia plans to offer a hybrid GSM-DECT service. This would allow users to make calls from an Ericsson handset inside their offices using DECT (the Digital European Cordless Telecommunications Standard), but switch to GSM when they leave the building. If the tests, using dual-mode handsets, are successful, it will launch a service next year.

As the number of services available over mobile phones expands, a new type of pan-Eu-

ropean service provider is emerging. For example, Unisource Mobile (a consortium of Swiss, Swedish and Dutch telecoms operators, which has links with AT&T) plans to provide a one-stop service for large companies using mobile voice, data, paging in several European countries.

It will provide consultancy, a single bill and buy and repackaging air time for its clients. It will also have stakes in or alliances with mobile network operators.

Most of the mobile data and enhanced services are being developed for digital mobile networks (either GSM or PCN). This will help to encourage business users currently using old analogue networks to



Nokia Orange mobile phone: what interests mobile operators is how to get people to spend more on services

UK cellular telephone subscribers

| Operator | System | Launch | Subscribers May 1995 | Subscribers May 1994 | Yearly growth % |
|-------------------|----------|----------|----------------------|----------------------|-----------------|
| Cellnet | TACS-900 | Jan 1985 | 1,752,900 | 1,057,359 | 65.78 |
| Cellnet | GSM | Jan 1994 | 41,000 | n/a | n/a |
| Vodafone | TACS-900 | Jan 1985 | 1,886,450 | 1,202,376 | 40.18 |
| Vodafone | GSM | Jul 1992 | 194,750 | 26,622 | 631.54 |
| Mercury One-2-One | DCS 1800 | Sep 1993 | 275,000 | 84,000 | 227.38 |
| Orange | DCS 1800 | Apr 1994 | 157,000 | n/a | n/a |

Source: Mobile Communications

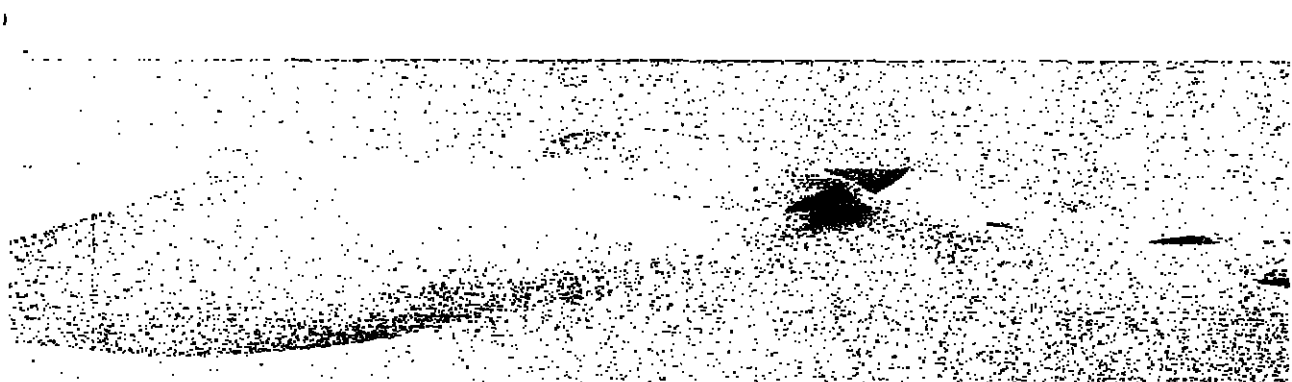
mobile operators Vodafone and Cellnet have both come up with packages to encourage them to switch. This is partly because their analogue networks are almost up to full capacity.

In the long term, analogue networks will probably be used by consumers rather than business users, then phased out.

As the business market for mobiles has matured, the consumer market has exploded. And in the consumer market, mobile phone use has had slightly more impact on the use of fixed telecoms. Consumers have made such extensive use of Mercury One-2-One's PersonalCall tariff—offering free calls at evenings and weekends—that it has increased the monthly subscription charge from £12.50 to £15.00.

But one day the difference between mobile and fixed telephony could be invisible. Users will simply own a phone that connects to whatever service is cheapest and most convenient at the time.

Joia Shillingford is Associate Editor of the Financial Times newsletter Business Computing Brief



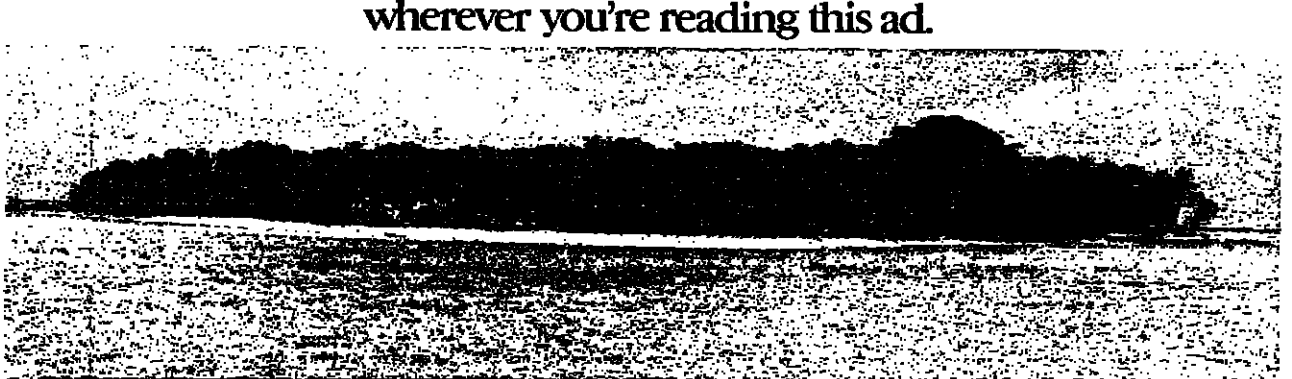
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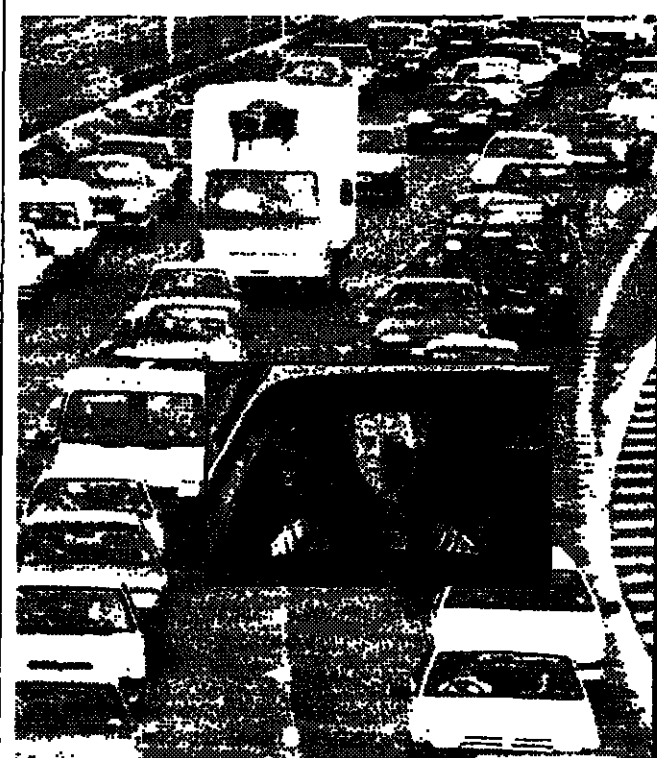
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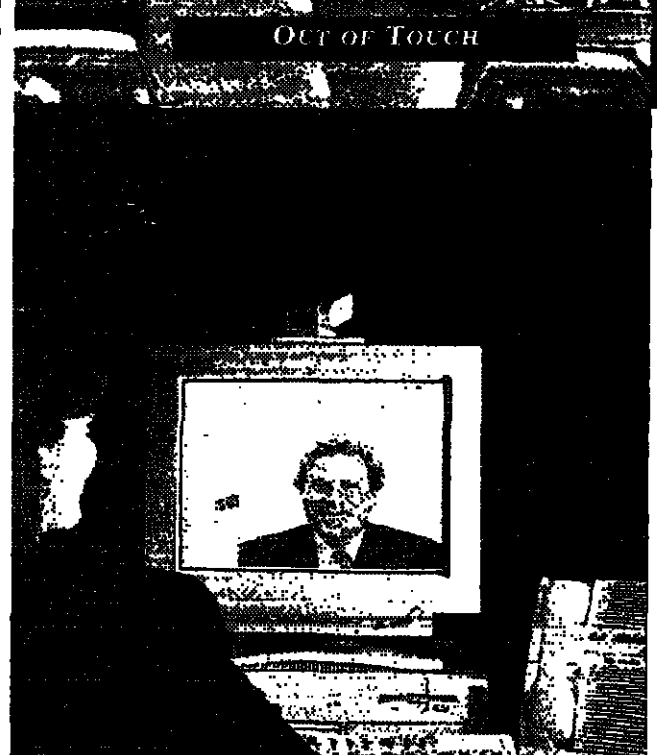
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UK cable networks: Raymond Snoddy reports on a change of emphasis

Focus switches to telephones

Telecommunications has become a central part of what used to be the cable television business in the UK and indeed many operators now expect the majority of future revenues to come from the telephone rather than extra channels of television.

In recognition of the change in emphasis, the Cable Television Association has even changed its name to the Cable Communications Association.

The latest official figures from the Independent Television Commission show that by the beginning of April no less than 75 cable franchises were offering telephony and that 789,315 residential lines had been installed plus a total of 83,358 business lines.

The figures are very respectable given that the total number of homes subscribing to cable services of any kind is only around the 1m mark.

What is more remarkable than the total numbers of lines is the rate of increase in tele-

Cable operators have also found that the "churn" or disconnection rates are much lower for telephone subscribers than for those who just want extra television channels.

The UK was the pioneer in deregulating the telecommunications industry to allow cable to offer competing telephone services, although Mr Karel Van Miert, the European Union competition commissioner, hopes this will be law throughout the EU by 1998.

In business telecommunications, the extra competition for BT has developed slowly since the end of 1987 when Windsor Television, one of the first of the experimental cable television franchises, began offering telecoms services to 30 companies on the Slough trading estate in its franchise area - a scheme that had spread to more than 500 businesses within the next year.

Since then, it has become obvious just how important the business sector is to the cable industry - mainly because businesses are heavy telecoms users and when they switch to cable they tend to install multiple lines.

Virtually all the new cable being laid is able to offer both television and telephony services

phony subscribers. Over the past year the total number of lines installed has shot up from 376,795 to the most recent total of 872,573. And leading American cable and telecoms groups such as TeleWest and Nynex or CableTel and Bell Cablemedia are committed to investing billions of pounds in building sophisticated communications networks giving more and more consumers and businesses the ability to subscribe to cable telecommunications.

This year, the industry plans to construct cable networks past about 2.5m homes and businesses - twice last year's rate.

Now virtually all the new cable being laid is able to offer both television and telephony services and the two services are usually offered jointly.



Laying ducts for fibre optic cable on the Colt network in London

one that is the subject of considerable contention between the cable operators and BT - is number portability. At present, a company switching to cable telecoms has to change its number, something that many are reluctant to do. Instead, many install a number of lines for out-going calls.

OfTel, the telecoms regulatory body, has decreed that number portability is vital to effective competition but BT

and the cable industry has been unable to agree on who should pay what for the changes. The issue has now become entangled in a broader Monopolies and Mergers Commission investigation and will probably be delayed for at least a year as a result.

Despite this disadvantage, the cable industry has come up with a number of initiatives designed to encourage the growth of business telecoms.

Perhaps the most important is ICN, or Integrated Communications Network, which exploits the London Interconnect that links all the main London cable franchises. It was designed initially for television programme exchange but is now also being used for business.

Companies with branches throughout the M25 area can be linked yet deal directly with ICN and get a single bill rather than having to deal with a number of separate cable companies.

Plans are well advanced for similar interconnects in the Midlands, the North of England and Scotland. This raises the possibility eventually, if the cable operators can agree, of communication links between the leading cable franchises in the UK.

The big regional groupings would probably lease capacity to link them from other telecoms operators rather than building the connections themselves.

Other cable services being offered to companies include the use of sophisticated PABX exchanges without having to own them. The equipment is located at the cable company headquarters which handles the telecoms needs of local businesses.

Videotron, the Canadian group which is one of the largest cable operators in the UK, has even launched a PC-based business information service for subscribers in the Westminster area.

Because BT has the cable licence for Westminster, Videotron cannot offer a competing general cable television service to residents. Videotron can, however, offer a raft of specialist business television information direct to business PCs, including a special news service from Reuters.

The service gives an indication of the range of possibilities that cable telecommunications is likely to offer in future beyond trying to compete against the established telephone companies on price.



Teleworking: A recent report suggests there are fewer than 250,000 teleworkers in the UK. BT Picture: a BT photograph

Christopher Price looks at teleworking

Numbers stay limited

Who are the teleworkers of today? The predictions and forecasts of armies of workers liberated by new technology and beavering away in remote satellite locations seems to have been as much a part of the multimedia revolution as the enabling software.

Yet while technological strides have continued to update the equipment, the most recent and exhaustive surveys on teleworking in the UK suggest that far fewer organisations or workers have embraced the new culture than had been previously thought.

The surveys paint a more limited picture of its future prospects.

A recent report by researchers at Newcastle University suggests that fewer than 250,000 people - less than one worker in a 100 - in the UK can be classified as teleworkers.

This contrasts markedly with claims made by previous studies that more than 1m people work electronically from home.

The Newcastle University study, prepared for MIPs and presented to the UK Economic and Social Research Council, blames previously bloated forecasts on a "teleworking mythology" based on the experience of the relatively few companies which have actively participated in and promoted electronic teleworking.

"This has led to an exaggerated impression of the scale of home-based telework," says the report. It also blames self-interested groups, such as equipment suppliers, telecoms operators and user-friendly professionals, such as journalists and computer staff, for promoting the genre.

Recent studies in the European Union have also attempted to establish the level of teleworking

This view echoes a 1993 report for the Sheffield Department of Employment which stated that "teleworking has acquired a symbolic importance quite out of proportion to its actual prevalence." It estimated that less than one employee in 200 was a genuine teleworker.

However, as the Newcastle University study also points out, "The findings of these studies vary considerably depending on how a teleworker is defined and on the methodology employed." It classifies five types of teleworking:

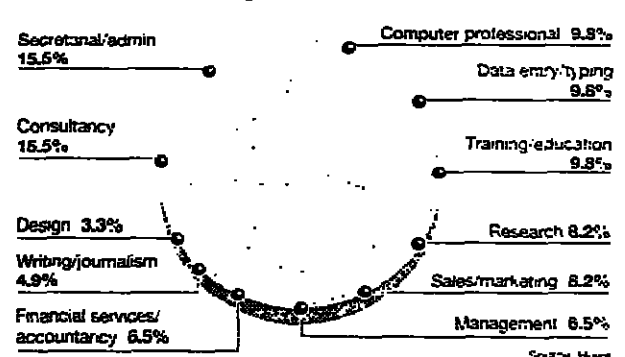
- Electronic home working: the most common form of teleworker, connected to work from home through a modem and other modern communications equipment;
- Telecommutes and neighbourhood centres: shared multimedia facilities, close to houses, reducing costs, favoured by development agencies;
- Mobile or nomadic working: teleworkers who operate both at home and on the road;
- Group or team telework: made possible by advances in technology to facilitate a "virtual team" located at any distance from each other;
- Call centres and remote offices: companies which have begun separating production functions creating electronic remote offices to handle mostly back office functions.

Recent studies in the European Union have also attempted to establish the level of teleworking. The EU, which is committed to promoting teleworking as a job-creating process, has established a project to monitor the development of teleworking in the region.

Early research for the project estimates that about 5 per cent of European organisations are involved in teleworking. The analysis was based on research in the UK, France, Germany, Italy and Spain, and estimated that the number of workers actively engaged in teleworking in the five countries stood at 1.1m. The report calculates that this could give a total figure for the EU of 1.5m.

Of the five countries, the UK had the biggest number of tele-

Teleworkers' occupations



workers at 580,000, according to the early EU research data. However, the definition of teleworking was a broad one and included employees who worked from home electronically for only one day a week.

The figure fell to 130,000 when considering just those workers who were employed electronically at home on a full-time basis.

France, in second place, had about half the UK total, with the other three countries about half as much again.

But other studies dispute the findings of the EU report. A 1993 French academic study put the number of teleworkers in France at just 16,000, albeit under a strict definition. However, the same report suggests that there will be about 350,000 French teleworkers by 2005.

The EU report claims that the number of teleworkers is likely to eventually rise to 11m - but declines to put a time-scale on events.

In the US, where teleworking is more developed, the number of workers has been estimated at about 4.5 per cent of the working population - or approximately 5.5m people. However, on a more detailed analysis, only 16 per cent of the sample - undertaken by a US university - telecommuted 35 or more hours a week.

Another study, by the Institute for the Study of Distributed Work, based in California, estimates that between 4m and 5m people, or 3.5 per cent of the US workforce, are teleworkers.

One thing is for sure, fore-

casting difficulties are not technologically-driven. Rather they are rooted in the complexities of organisations and the nature of work.

The potential benefits of teleworking are many. Home-based workers save on commuting time and travelling costs are correspondingly reduced. Teleworkers can also benefit from working in a more pleasant environment - the electronic homemaker connected to the superhighway from a distant rural site being the stereotypical image of the teleworker.

Workers can also gain from more flexible work patterns. Employers can benefit from correspondingly lower office costs. Teleworkers will in theory be at their desks longer and, it is claimed by some exponents, be more productive in a less stressful, more comfortable work environment.

But one of the biggest obstacles for would-be teleworkers is middle management, a factor emphasised in several studies. According to the Newcastle University report, this management tier fears both loss of status and difficulties controlling an absent workforce.

In addition, many employees prefer to work in traditional offices. "Some people prefer to work alone but for many others the office or factory represents a social milieu as well as a workplace," says the Newcastle report.

Review of Telework in Britain: Implications for Public Policy. University of Newcastle, Newcastle NE1 7RU. Price £20.

The videoconferencing industry believes its time has come, writes Sheila Jones

Ready to go for a mass market

Everything seems to be falling into place for the videoconferencing industry. Standards are being agreed, processing power is increasing, and there is a growing demand for new and better channels of communication.

The industry believes its time has come. No matter that it has been saying so for years. There is a growing conviction that videoconferencing is ready to go for a mass market.

Sales are rising, particularly for systems based on personal computers. In the past, large, expensive room-conferencing and portable systems have dominated the market.

GartnerGroup, the US research organisation, suggests in a recent research paper, that the market is shifting rapidly in favour of PC systems. It points out that producers are now bundling videoconferencing capacity with other software rather than selling it as a distinct application. This will change further in the next couple of years, Gartner predicts, with videoconferencing likely to be embedded in most software applications programs as standard.

There are several factors fuelling demand, says Tim Duffy, European vice-president at PictureTel, the US "We've now got the convergence of processing power being available to produce very good, high quality pictures; we've got a network that's come into place - the ISDN network - which is



The technology is improving: it is possible to provide broadcast-like picture quality over digital telephone lines

a full, digital, dial-up network virtually everywhere in the world, and a massive globalisation of industry taking place which is generating huge demand for communications around the globe and video files that gap.

PictureTel, a market leader, has seen its turnover climb from \$4m in 1988 to \$25m last year.

Mr Duffy's view is echoed across the industry, although some analysts believe that while prices are now falling, since agreement on industry-wide standards governing data transmission, they will have to

fall further if videoconferencing is to make an impact beyond niche markets.

The add-ons needed to enable PC videoconferencing can cost about \$3,000 or more per terminal. John Matthews, a consultant at Ovum, the UK-based research group, says prices "need to head for about \$1,000 to \$1,500" before such investment is no longer seen by business managers as a difficult decision.

Nonetheless, niche markets are already fuelling sales. Law firms, publishers, health and design agencies are early users. Telemedicine, is catching on around the world, particularly in the US, where doctors are making remote diagnoses of patients through mainly PC-based videoconferencing networks.

Health agencies say the technology is helping them to cut travel costs and widen access to treatment. Medical applications are also growing in Europe. In the UK, a pilot scheme is under way in Montgomery, Wales, for dermatology patients. The system, which operates on British Telecoms communications equipment and IBM software, allows GPs to refer their patients to a specialist live from the doctor's surgery. Specialists can examine a patient, looking at stills or moving pictures. They can discuss the case, share medical notes and make diagnoses via the PC.

Philip Hamer, who runs a firm of solicitors in Hull, in the UK, uses Intel's Proshare system to replace conventional meetings with barristers and witnesses before trials. Mr



Duffy: 'There is huge demand for communications around the globe'

Hamer says the firm has saved time and dramatically cut travel costs. He adds that videoconferencing is "much more intimate than the phone".

Data compression - which enables pictures, sound and text to be transmitted on phone lines - has yet to produce the sort of quality we see every day on the television. Pictures on PC-based systems can be juddery, and some systems are better than others at reducing sound echo and improving sound and picture synchronisation. But the industry argues that live pictures can dramatically improve communication.

Research in the US has indicated that only a small amount - possibly as little as 11 per cent - of the information a caller wishes to convey is communicated in a conven-

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expected to cost \$2.6bn at 1994

Madley earth station: competing consortia claim there will be substantial rewards for satellite operators

It is estimated there will be more than 1m personal mobile satellite customers by 2000

Mr Bill Gates, chairman of Microsoft, the software house, and Mr Craig McCaw, a wealthy cellular phone pioneer, have also united to declare an interest in developing a satellite phone system.

The only Europe-based contender is Inmarsat-P, a wholly-owned offshoot of the Inmarsat organisation. Some 39 of its members agreed last January to contribute \$1.4bn in funding the initial phase of a project

There are essentially two low-cost approaches to satellite telephony. The first - low earth orbit, favoured by Frido - involves launching between 24 and 66 satellites in an orbit less than 10,000km above the earth's surface. The second, medium earth orbit involves placing only 12 or so satellites in space between 10,000km and 20,000km up. Odyssey and Immarsat-P both favour this solution, which they claim is much less expensive than either low earth orbit

or the geostationary satellites used for communications today.

TRW claims to have invented the medium earth orbit. A patent on the orbit would hamper severely Inmarsat-P's progress in the satellite race. The US company said: "These patents give TRW exclusivity for our mobile communications system"

In the event, the patents were dramatically withdrawn by the US Patent Office on the expected day of issue. While the reasons are not fully understood, it is thought the controversy stirred up by TRW's apparent attempt to "patent space" forced the Patent Office to review the issues involved.

It is entirely possible that elements of the Odyssey systems are unique and that patents will eventually be granted for them. But it is unlikely to be able to keep Inmarsat and others out of medium earth orbit. There will be more earthly skirmishing before the battle in space can begin.

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A recent business executives' survey found four hours a week - or 10 per cent of time - obtaining basic business information such as phone numbers, addresses and times of trains. The results are from a survey carried out last year by Benchmark Data Services Inc., of Princeton, creators of the online business information site *Bizbase*. And the average UK executive said he spent 16 per cent of salary on information-gathering by electronic means, although we are in the unenviable position of having a high cost in obtaining information.

first place, it would appear that the FBI may provide us with the material we need. We would be able to use this information we were to acquire by "surfing the web." It is true that a vast amount of information is stored on computers and that a considerable proportion of it is accessed via telephone lines. It is not sufficient that the information must know where it is to be accessed. It and it is something that filters mountains of data and isolates the specific information required. And, as specialist operators have grown more adept in this field, there is no doubt that they are becoming more adept in obtaining information and information about the Internet and obtaining information as well as sorting it prior to presentation of management.

Most of this information falls into two categories: the general statistics, numbers, travel timetables

ISDN has finally caught on in Britain, reports Richard Handford

Fresh applications emerge

1995 is proving to be the year when two previously unsuccessful data technologies came into their own: the integrated services digital network (ISDN) and the transmission of data over wireless networks.

The two technologies appear to have found solutions to the woes which had previously left them in obscurity. The emergence of new applications is helping both ISDN and mobile data to finally strike it rich with customers.

Of the two types of ISDN service offered in the UK - basic rate or ISDN2 offered only by British Telecommunications, and primary rate or ISDN30 offered by both BT and rival Mercury - it is the former that is attracting attention for its new data applications. ISDN30 is used mainly to carry voice traffic.

Over the past two years, ISDN2 has moved away from being purely a back-up service for a customer's private circuit. Two years ago, 55 per cent of ISDN lines were only used in times of exceptional demand when excess data could overflow onto them. Now the situation has changed as customers choose ISDN for applications such as file transfer, the interconnection of computer local area networks (Lans) and access of remotely situated Lans. These applications now account for nearly 50 per cent of all ISDN lines and the full-rate option accounts for only 14 per cent of lines.

The new-found popularity of ISDN has benefits for BT since the newer

applications are likely to generate higher call revenues.

BT likes to talk about the growth in ISDN2 connections, pointing out they grew by 147 per cent in the financial year 1994-95. However, it should be remembered the original base was so low any growth looks impressive. BT itself does not reveal the number of ISDN2 connections but industry opinion puts the figure at about 55,000 at the end of 1994.

The UK lags far behind other European countries in the ISDN stakes. At the end of last year France had 250,000 basic rate connections and Germany in the region of half a million. The usual argument put forward by BT's critics for the discrepancy is the cost of ISDN2 installation in the UK compared with that elsewhere in Europe. BT's £400 charge is viewed as an important barrier to new users, particularly among small and medium-sized businesses and residential customers.

Critics point to the cellular industry where low entry price in the form of cheap handsets has led to an explosion in demand. BT replies that the structure of competition in the UK's fixed telephony market precludes this kind of hold pricing move.

Some believe that, entry price notwithstanding, an important period of rapid growth is imminent for ISDN

among users outside the corporate market. It will be the result, says Keith Mallinson of the Yankee Group consultancy, of an unlikely alliance between "centralised, bureaucratic" ISDN, the brainchild of conservative telephone companies, and the "organic, anarchic" Internet.

Mr Mallinson foresees Internet access as a huge market for ISDN. Particularly if BT's installation charges come down. The problems for the UK's mobile data industry have been even more severe than that of ISDN. Subscriber numbers have doubled over the past year but only from 20,000-30,000 to 40,000-50,000 as the

'The holy grail is to connect the millions of lap-tops in Europe to a mobile data network'

UK's four specialist operators seem largely to have searched for niche markets working out in the field. Now some in the industry see the opportunity to reach a wider audience. "The holy grail is to connect the millions of lap-tops around Europe to a mobile data network," says Martin Garner of the Ovum consultancy. "It's a far bigger market than that for traffic wardens and policemen."

Mr Garner believes the evolution of technology and new approaches to the way the service is offered will open up a huge potential market among travelling executives. The means for serving this market is likely to be the GSM digital cellular networks now used by millions

of mobile phone customers across Europe. The network has the capability to carry data as well as voice services.

Operators of GSM networks want their customers to connect their phones to a modem and lap-top to send data. Such a service would boost the call revenues for the network operators. The technology to facilitate this is now emerging.

Last year, leading telecoms manufacturers including Ericsson and Nokia began to make commercially available the necessary modems, and the software package Microsoft Windows 95, to be launched this summer, will put a heavy emphasis on its mobile data capabilities.

In the UK, cellular operators Cellnet and Vodafone already offer data services over their GSM networks. Orange, one of the UK's two Personal Communications Network (PCN) operators, is also thought to be interested.

The UK has also seen the emergence of service providers in the mobile data market with BT's decision earlier this year to sell a service over Cellnet's GSM network. BT, which owns a 60 per cent stake in Cellnet, will offer the service with US computer manufacturer Apple.

The role of service providers, who do not actually own a network but use their marketing skills to attract customers, has been judged crucial in the growth of the UK's cellular industry and might likewise invigorate the mobile data market.

EDI is making slow progress, says George Black

UK still leads the field

A couple of years ago the leading industrialist Sir John Harvey-Jones criticised his senior business colleagues for failing to take advantage of electronic data interchange (EDI).

Today, he would probably find that not much has changed. Only between 10,000 and 20,000 UK companies have adopted electronic, or paperless, trading - yet the UK is still ahead of most European countries and in some fields also ahead of the US. Even among the UK companies which have adopted EDI, many still make very limited use of it and some still do extensive and avoidable re-keying of data.

The take-up varies greatly between industry sectors - the retail, health-care and electronics industries are among the leaders, government generally is a laggard - but overall progress has not been as rapid as proponents of the technology expected a decade ago.

They now hope that a projection from the research firm Frost and Sullivan of a quadrupling of the international market by 2001 will prove accurate.

"There is still much more to do," admits Mr John Jenkins, director of corporate affairs for GE Information Services which runs Tradenet, the UK's largest EDI network, and other international EDI services.

"The rate of adoption is slowing and is disappointing," says Mr Gary Lynch, chief executive of the UK EDI Association (Edia).

Mr Jenkins says there is no important technical barrier, but senior managers are reluctant to see EDI as a business issue which they need to tackle. "Boards of directors still see it as a technical issue for their information technology departments, not for themselves," he says.

Mr Lynch thinks that the expression "electronic data interchange" is itself a deterrent to many managers, to whom it sounds too technical. However, there are plenty of examples of companies which have prospered by adopting EDI to encourage others to copy them. The most quoted case in the UK is probably that of the Tesco supermarkets

chain, which has revolutionised the way it does business in the past few years. The improvement in the efficiency of its supply chain is generally recognised to be an important component in its success.

But for every Tesco there are dozens of other big and small companies which have been unresponsive to the new technology.

Mr Jenkins contends that what EDI in the UK needs now is an articulate advocate. In the US, Vice-President Al Gore has championed the cause of building an information superhighway and thereby greatly increased public awareness worldwide of the potential of the Internet.

"We need an Al Gore to help us bring EDI to the top of the

The popularity of Internet gives EDI promoters a new opportunity

management agenda," says Mr Jenkins. "It can make UK pic more competitive. We have a lead, but we must maintain it."

"There is a lack of clear direction from the government side," complains Mr Lynch. "What we want to see is government using it more. This would send a signal to UK industry that it is a better way to trade."

The popularity of the Internet gives the promoters of EDI a new opportunity. Mr Lynch says: "I am trying to ride the wave of interest in the Internet, to explain to people that EDI and the Internet are both part of electronic commerce."

Perhaps the most contentious issue in the area of electronic trading at the moment is whether the Internet is capable of becoming a vehicle for this sort of activity.

Mr Jenkins argues that it is not yet ready, mainly because of the lack of security, but he thinks that it is already playing an important role in promoting understanding of the electronic marketplace and "extending the shelf space of suppliers."

Among small and medium-sized businesses, EDI is still seen as a mixed blessing. Many managers are afraid of the

technology or just do not have the time to study it.

More positively, many small businesses find that being able to advertise their competence in EDI can bring a rapid increase in business. A survey by the EDI World Institute last year found that nearly 70 per cent of such companies reported improved efficiency from EDI and more than half experienced improvements in financial performance.

As more global standards emerge, EDI should also enable them to build international businesses. The Association of British Chambers of Commerce is involved with the Edia in a two-year programme backed by the European Union to promote the use of EDI among small and medium-sized enterprises. Mr Elizabeth Boyd-Adam, its commercial director, says: "Up to now, smaller companies have been on the receiving end of instructions from their customers. We want to level the playing field so they can make informed decisions about the best technology to adopt."

"It's the language of the future, as far as we are concerned for trading in the international marketplace."

One problem which is still deterring many smaller businesses from moving to EDI is the difficulty of integrating their accounting software with EDI systems. They have had to call on the services of a software house to glue the systems together, and many have felt it was not worth the trouble or the cost. However, some of the top accounts package vendors such as Multisoft and Pegasus have now started to provide an interface from their programs to EDI systems. Other leaders in the field are likely to do the same.

Meanwhile, the Edia has developed a proposed standard application programming interface which should be available to systems developers by the end of the year.

These developments may contribute to making EDI more attractive to the hundreds of thousands of smaller UK companies which have yet to enter the brave new world of electronic commerce.

Profile: the EU-funded Visinet project

Aid to collaboration

An architect and his client - one based in Lisbon, Portugal, and the other in Eindhoven, Netherlands - walk together around a "virtual city" examining new designs and road layouts. This is no longer a futuristic vision of what might be, but something which has been taking place in the past six months, writes Monica Horton.

The virtual city has been made possible by a European Commission-funded project known as Visinet, investigating the uses of an information superhighway for architects and industrial designers.

The project, which cost Benzin, provides the facility for a Lisbon architect on a project to remodel large areas of the city. Using three-dimensional visualisation software on high-powered Silicon Graphics workstations, with an eight megabit a second transmission link between the two cities, the client and architect are able to hold discussions without meeting in person.

Visinet indicates the type of benefits which many businesses could obtain if they choose to exploit the new superhighway technologies. The information superhighway will provide transmission speeds that are many times that of even the fastest telephone lines in use today: the average data transmission today is at 64 kilobits a second (also the speed on an ISDN connection). Some companies have lines at 2 megabits a second, and a rare few might have more than that. The superhighway speeds will provide up to 155 megabits a second, and eventually even higher, up to 2 gigabits a second.

In practice, that means that a four-page multimedia document, including video clips and images, would take only one second to transmit, compared with 41 minutes today. And the technology is dis-

tance-independent - irrespective of the location of the two people communicating, the data will get there in the same time.

Given that situation, it would seem to matter less whether two people working on a project are located in the same building or several hundred miles apart. According to John Moroney, senior consultant with London-based market researchers Ovum, the information superhighway will facilitate collaborative working on product design and development in a way that has not been possible before.

It will allow businesses to have a common data source across all departments involved in bringing a product to market - marketing, design, production, sales and post-sales, even where those groups are geographically remote. The result should be shorter product-to-market cycles. For example, a European fashion manufacturer with factories in the Far East could install a high-speed video link between sites on both sides of the world. Changes to garments can be made almost at the last minute to accommodate unforeseen market demands.

"The potential for this type of application is good," says Margaret Hopkins of Cambridge-based consultancy Analysys. "It is rare nowadays for all the people involved in a particular project to be on one site. By using these techniques it is possible for them all to be fully involved."

An extension of collaborative working could also include the customers, according to Nick Hughes, head of IT strategy and policy at the PA Consulting Group. "Producers will be able to talk to customers directly for the first time, eliminating the middle operator. Thus business gets feedback directly into how its products are being used," he said.

But many businesses will take advantage of the superhighway just to improve what they have now run. Most companies now run at least some of their computing systems on local area networks, or Lans, using software that is known as client-server. Client-server software is designed so that any terminal can theoretically access any host or server computer. In practice, people in different parts of the business can get into databases other than those in their department, with the result that business information is shared across the wider organisation.

However, Lans transmit at 10 megabits a second on average. Today, they cannot maintain their transmission speeds on links to external sites, because of the limitations of telephone lines. In other words, where it takes a few seconds to get data from a database in the same building, it takes minutes to retrieve information from one on another site. The information superhighway will solve the problem so that businesses should be able to operate more efficiently across different sites and countries.

Some companies are already beginning to take advantage of the early high-speed lines that are becoming available. BT, for example, claims that about 30 customers are already using its high-speed service known as SMDS (switched multimegabit data service). Transmission is possible at varying speeds up to a maximum of 25 megabits a second.

Torch Telecom has already installed a 34 megabit a second link for the Leeds General Infirmary and St James's hospital. It is used by trainee surgeons who watch keyhole surgery operations taking place in an operating theatre on the other side of town. They can converse with the surgeon using a video conferencing unit.

However, before such facilities become available on a national or global basis, the cost of the lines has to come down. Traditional pricing of telephone lines is done by distance and by speed. But, at the

superhighway speeds, today's pricing models make a line so expensive that even the largest corporations cannot afford them.

BT is getting around the issue with SMDS by putting it in a different class of service - it is tariffed as a systems licence service which means that BT does not have to link it to existing line prices. The service tariff is at a flat rate, irrespective of the distance between the two sites to be connected.

But Mr Hughes fears that irrespective of service availability or tariff drops, most businesses are a long way from being able to take advantage of the superhighway. "The number of organisations that are yet thinking about how they might exploit the benefits of the superhighway are few and far between. And there are even fewer that can conceptualise the benefits."

Other companies are looking at the much higher speed lines offered by the UK's new telecoms operators. Yorkshire-based Torch Telecom says it is talking to financial institutions within its Yorkshire North Humberside region about providing a managed telecommunications facility at 155 megabits a second. The facility would be used to improve communications to high street branches, especially where they are using client-server, lan-based software applications.

Torch Telecom has already installed a 34 megabit a second link for the Leeds General Infirmary and St James's hospital. It is used by trainee surgeons who watch keyhole surgery operations taking place in an operating theatre on the other side of town. They can converse with the surgeon using a video conferencing unit.

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ON-LINE INFORMATION SERVICES

Specialists provide the key

On average, business executives and PAs spend four hours a week - or 10 per cent of their time - obtaining basic business information such as phone numbers, company information and times of trains. This was one of the findings of a survey carried out earlier this year by Benchmark Research on behalf of Phonelink, creators of Tel-Me, the on-line business information service.

With the average UK executive salary at £40,000 and other staff overheads running at about 100 per cent of salaries, the cost of information-gathering by executives is therefore about £5,000 for each employee. Hence, although we are in the information age, there is a high cost in obtaining that information.

At first glance, it would appear that the Internet could provide us with the solution to our every need. We would be able to find the exact information we wanted on any topic just by "surfing the web".

It is true that a vast amount of information is stored on computers around the world - and a considerable proportion of it can be accessed via telephone lines. However, it is not sufficient that the information exists; one must know where it is and how to access it. And it is sometimes necessary to filter mountains of data to locate the specific information required. A number of specialist operators have grown to meet these needs.

There is nothing new in having specialists to assist in obtaining information. Librarians and information specialists manage and obtain information as well as filtering and sorting it prior to presenting it for management.

Much of this information falls into two basic categories: the general, such as phone numbers, travel timetables and

road information; and the special which may relate to markets, product specifications, data sheets and price lists.

Before the Internet, it was a simple task to despatch someone to get the necessary information. Today, however, we need more effective ways. Consequently, information services companies target large installed bases of potential users - such as Windows-based PC users - especially where users employ an integrated services digital network (ISDN) either directly or

The service is designed so that inquiry details are prepared off-line before the call is made

via a local area network (Lan). For example, Tel-Me provides near-instant access to services including Thomson Classified directories, CCN and Info-check credit checking, PA for live news, BT's Teledirectory service, Ordnance Survey, British Rail information, the AA and weather reports.

The service is designed so that the inquiry details are prepared off-line before the call is made. This reduces the cost of calls. Customers are not limited to those working in the financial and business sectors. The groundmen at Hillsborough rely on up-to-date weather forecasts to maintain the condition of the pitch for football matches. In addition, Sheffield Wednesday use Tel-Me when playing away to provide road directions to the venues via "Map-per". Information about hotels and restaurants from the AA Travelogue is used to help supporters find somewhere to stay.

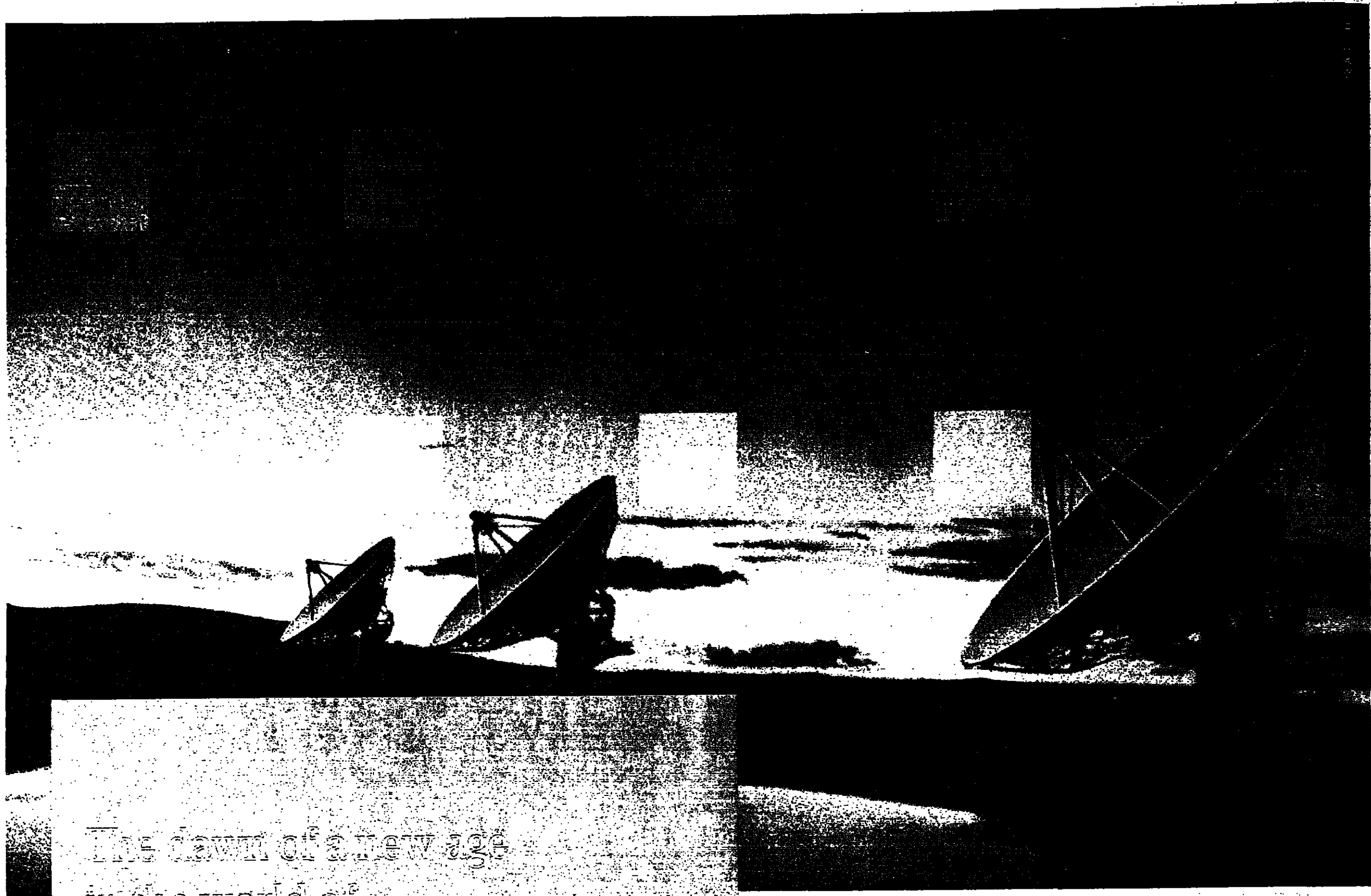
While Tel-Me offers a wide range of business services, On Demand Information (ODI) publishes information products offering specialist business and product information to subscribers within specific market segments as well as developing bespoke applications.

For example, ODI is targeted at the construction industry and offers specifiers and buyers access to colour product catalogues and other information provided by more than 5,500 building products suppliers in addition to detailed engineering design and technical standards from many organisations including the British Standards Institution (BSI).

ODI has also been working with the Employment Services Agency to develop and implement a pilot information management system in the Nottingham area linked to ODI's central server in Leeds. This will allow Job Centre staff to have immediate private access to operational employment services information normally distributed on paper.

However, people are not always in the office. To meet this need, Reuters has launched the first palm-top Reuter workstation, the Reuter Personal Assistant. It provides Reuter Terminal users with a portable and effective remote access to their office terminal via a Psion 3a organiser so that they are able to retrieve and display Reuter data in a familiar format from any location with a phone line.

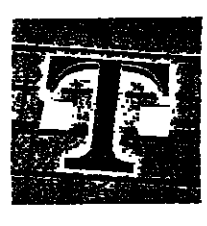
Overall, even though the number of executives who are web-surfers will grow, the number who will look to specialist information services companies can be expected to grow even faster.



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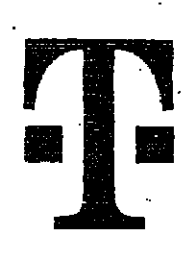
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Our connections move the world.

Deutsche
Telekom



Suez and SGB form joint group to take off take

...the joint venture...

airport project faces...

...the project...

life in Greek earthquake...

...the earthquake...

industrial output...

...the output...

group clinches...

...the group...

plan to bring forward...

...the plan...

and says Palestinian...

...the Palestinian...

large's new car sales...

...the car sales...

car dealers fear...

...the dealers...

Italy seeks new...

...the Italy...

may sell US...

...the US...

arms spending...

...the spending...

20 raises Israeli...

...the Israeli...

and Lynch to...

...the Lynch...

Italy's budget...

...the budget...

China risks...

...the China...

UK's collapse...

...the UK...

declared in...

...the declared...

by Gallagher...

...the Gallagher...

UK MARKET INDICES

| Index | Value | % Chg |
|--------------|----------|-------|
| FTSE 100 | 4,438.00 | +0.12 |
| FTSE 250 | 3,011.73 | +0.01 |
| FTSE 100/250 | 1,480.70 | +0.05 |
| FTSE 100/250 | 3,070.4 | +0.06 |
| FTSE 100/250 | 1,487.25 | +0.07 |

UK LUNCHTIME RATES

| Rate | Value |
|------|-------|
| 3m | 5.75% |
| 6m | 5.75% |
| 12m | 5.75% |
| 18m | 5.75% |
| 24m | 5.75% |

UK OTHER RATES

| Rate | Value |
|------|-------|
| 3m | 5.75% |
| 6m | 5.75% |
| 12m | 5.75% |
| 18m | 5.75% |
| 24m | 5.75% |

UK MONTHLY SEA OIL (Argus)

| Oil | Value |
|-------|---------|
| Crude | \$17.85 |
| Gas | \$37.40 |

UK FINANCIAL TIMES

| Index | Value |
|--------------|----------|
| FTSE 100 | 4,438.00 |
| FTSE 250 | 3,011.73 |
| FTSE 100/250 | 1,480.70 |
| FTSE 100/250 | 3,070.4 |
| FTSE 100/250 | 1,487.25 |

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